

1 RoboCup Middle Size League Bibliography

This bibliography digest intends to gather the most relevant documents to the RoboCup Middle Size League.

It is organized chronologically, starting in 1997, and includes all type of references including technical reports, Master and Phd Thesis and open source documents available in PDF.

There is no guaranty that this list is complete. Therefore, the RoboCup and MSL community, as well as any other researchers with interests in this field are welcome to contribute by pointing out errors, inconsistencies or missing data.

If you want to add a new entry to this list, please send a bibtex compatible reference.

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Bibliography

- [1] H Matsubara, I Nods, and S Suzuki. A report on robocup-97. In *Intelligent Robots and Systems, 1997. IROS'97., Proceedings of the 1997 IEEE/RSJ International Conference on*, volume 3, pages PS–PS. IEEE, 1997.
- [2] Sara Reese Hedberg. Robots playing soccer? robocup poses a new set of challenges in intelligent distributed computing. *Concurrency, IEEE*, 5(4):13–17, 1997.
- [3] Hiroaki Kitano. *RoboCup-97: robot soccer world cup I*, volume 1. Springer, 1998.
- [4] Itsuki Noda, Shoji Suzuki, Hitoshi Matsubara, Minoru Asada, and Hiroaki Kitano. Overview of robocup-97. In *RoboCup-97: Robot Soccer World Cup I*, pages 20–41. Springer, 1998.
- [5] Jens-Steffen Gutmann, W Hattzack, Immanuel Herrmann, Bernhard Nebel, Frank Rittinger, Augustinus Topor, Thilo Weigel, and Bruno Welsch. The cs freiburg team. In *Proceedings of the second RoboCup Workshop*, pages 451–458, 1998.
- [6] Minoru Asada, Sho'ji Suzuki, Yasutake Takahashi, Eiji Uchibe, Masateru Nakamura, Chizuko Mishima, Hiroshi Ishizuka, and Tatsunori Kato. Trackies: Robocup-97 middle-size league world cochampion. *AI Magazine*, 19(3):71, 1998.
- [7] B Nebel, W Hatzack, T Weigel, JS Gutmann, I Herrmann, F Rittinger, and A Topor. Cs freiburg's participation at robocup'98: The world champions in robotic soccer1this work has been partially supported by deutsche forschungsgemeinschaft dfg as part of the graduate school on human and machine intelligence, by medien-und filmgesellschaft baden-wurtemberg mbh mfg and by sick ag, who provided the laser range finders. *Aicommunications*, 11(3-4):3–4, 1998.
- [8] Giovanni Adorni, Stefano Cagnoni, and Monica Mordonini. Genetic programming of a goal-keeper control strategy for the robocup middle size competition. In *Genetic Programming*, pages 109–119. Springer, 1999.
- [9] Jens-Steffen Gutmann, Wolfgang Hatzack, Immanuel Herrmann, Bernhard Nebel, Frank Rittinger, Augustinus Topor, Thilo Weigel, and Bruno Welsch. The cs freiburg robotic soccer team: Reliable self-localization, multirobot sensor integration, and basic soccer skills. In *RoboCup-98: Robot Soccer World Cup II*, pages 93–108. Springer, 1999.
- [10] J-S Gutmann, Thilo Weigel, and Bernhard Nebel. Fast, accurate, and robust self-localization in polygonal environments. In *Intelligent Robots and Systems, 1999. IROS'99. Proceedings. 1999 IEEE/RSJ International Conference on*, volume 3, pages 1412–1419. IEEE, 1999.
- [11] Andrea Bonarini, Paolo Aliverti, and Michele Lucioni. An omnidirectional vision sensor for fast tracking for mobile robots. In *Instrumentation and Measurement Technology Conference, 1999. IMTC/99. Proceedings of the 16th IEEE*, volume 1, pages 151–155. IEEE, 1999.
- [12] JS Gutmann, W Hatzack, I Herrmann, B Nebel, F Rittinger, A Topor, and T Weigel. Reliable self-localization, multirobot sensor integration, accurate path-planning and basic soccer skills: Playing an effective game of robotic soccer. 1999.
- [13] Byoung-Ju Lee, Sung-Oh Lee, and Gwi-Tae Park. Trajectory generation and motion tracking control for the robot soccer game. In *Intelligent Robots and Systems, 1999. IROS'99. Proceedings. 1999 IEEE/RSJ International Conference on*, volume 2, pages 1149–1154. IEEE, 1999.

- [14] HG Okumo, Yukiko Nakagawa, and Hiroaki Kitano. Integrating auditory and visual perception for robotic soccer players. In *Systems, Man, and Cybernetics, 1999. IEEE SMC'99 Conference Proceedings. 1999 IEEE International Conference on*, volume 6, pages 744–749. IEEE, 1999.
- [15] Yoshio Matsumoto, Takeshi Miyazaki, Masayuki Inaba, and Hirochika Inoue. View simulation system: a mobile robot simulator using vr technology. In *Intelligent Robots and Systems, 1999. IROS'99. Proceedings. 1999 IEEE/RSJ International Conference on*, volume 2, pages 936–941. IEEE, 1999.
- [16] Carmelo Amoroso, Edoardo Ardizzone, Vito Morreale, and Pietro Storniolo. A new technique for color image segmentation. In *Image Analysis and Processing, 1999. Proceedings. International Conference on*, pages 352–357. IEEE, 1999.
- [17] Barry Brian Werger. Cooperation without deliberation: A minimal behavior-based approach to multi-robot teams. *Artificial Intelligence*, 110(2):293–320, 1999.
- [18] Giovanni Adorni, Stefano Cagnoni, and Monica Mordonini. Purposive visual perception and co-operative behaviour: Some issues for the design of physical agents. In *Human and Machine Perception 2*, pages 107–123. Springer, 1999.
- [19] Kosei Demura, Kenji Miwa, Yasuyuki Asano, Hiroki Igarashi, and Daitoshi Ishihara. Matto: Towards a pass-based tactics. *RoboCup-99: Team Descriptions Small and Middle Leagues*, pages 163–169, 1999.
- [20] C Amoroso, A Chella, V Morreale, and P Storniolo. A feed-forward neural network for robust segmentation of color images. In *Neural Nets WIRN Vietri-99*, pages 159–164. Springer, 1999.
- [21] Birgit Graf. *Robot soccer*. PhD thesis, Universität Stuttgart, Fakultät Informatik, 1999.
- [22] Jens-Steffen Gutmann, Wolfgang Hatzack, Immanuel Herrmann, Bernhard Nebel, Frank Rittinger, Augustinus Topor, and Thilo Weigel. The cs freiburg team: Playing robotic soccer based on an explicit world model. *AI Magazine*, 21(1):37, 2000.
- [23] Luís B Almeida, José Azevedo, Carlos Cardeira, Paulo Costa, Pedro Fonseca, Pedro Lima, António Fernando Ribeiro, and V Santos. Mobile robot competitions: fostering advances in research, development and education in robotics. 2000.
- [24] James Brusey and Lin Padgham. Techniques for obtaining robust, real-time, colour-based vision for robotics. In *RoboCup-99: Robot Soccer World Cup III*, pages 243–253. Springer, 2000.
- [25] Claudio Castelpietra, Luca Iocchi, Daniele Nardi, Maurizio Piaggio, Alessandro Scalzo, and Antonio Sgorbissa. Coordination among heterogeneous robotic soccer players. In *Intelligent Robots and Systems, 2000. (IROS 2000). Proceedings. 2000 IEEE/RSJ International Conference on*, volume 2, pages 1385–1390. IEEE, 2000.
- [26] Carmelo Amoroso, Antonio Chella, Vito Morreale, and Pietro Storniolo. A segmentation system for soccer robot based on neural networks. In *RoboCup-99: Robot Soccer World Cup III*, pages 136–147. Springer, 2000.
- [27] R Polesel, R Rosati, A Speranzon, C Ferrari, and E Pagello. Using collision avoidance algorithms for designing multi-robot emergent behaviors. In *Intelligent Robots and Systems, 2000. (IROS 2000). Proceedings. 2000 IEEE/RSJ International Conference on*, volume 2, pages 1403–1409. IEEE, 2000.
- [28] Carlos F Marques and Pedro U Lima. Vision-based self-localization for soccer robots. In *Intelligent Robots and Systems, 2000. (IROS 2000). Proceedings. 2000 IEEE/RSJ International Conference on*, volume 2, pages 1193–1198. IEEE, 2000.

- [29] Jens-Steffen Gutmann, Thilo Weigel, and Bernhard Nebel. Fast accurate and robust self-localization in the robocup environment. In *RoboCup-99: Robot Soccer World Cup III*, pages 304–317. Springer, 2000.
- [30] Kosei Demura, Kenji Miwa, Hiroki Igarashi, and Daitoshi Ishihara. The concept of matto. In *RoboCup-99: Robot Soccer World Cup III*, pages 723–726. Springer, 2000.
- [31] Mansour Jamzad, Amirali Foroughnassiraei, Ehsan Chiniforooshan, Reza Ghorbani, Moslem Kazemi, Hamidreza Chitsaz, Farid Mobasser, and Sayyed Sadjad. Arvand: a soccer player robot. *AI Magazine*, 21(3):47, 2000.
- [32] A Bredendfeld, E Barakova, V Becanovic, Th Christaller, I Godler, T Hagiwara, S Hiraishi, H Inada, G Indiveri, K Ishii, et al. Gmd-musashi.
- [33] Frieder Stolzenburg, Oliver Obst, Jan Murray, and Björn Bremer. Spatial agents implemented in a logical expressible language. In *RoboCup-99: Robot Soccer World Cup III*, pages 481–494. Springer, 2000.
- [34] Sérgio Monteiro, António Fernando Ribeiro, and Paulo Garrido. Problems and solutions in middle size robot soccer: a review. 2001.
- [35] Claudio Castelpietra, Luca Iocchi, Daniele Nardi, Maurizio Piaggio, Alessandro Scalzo, and Antonio Sgorbissa. Communication and coordination among heterogeneous mid-size players: Art99. In *RoboCup 2000: Robot Soccer World Cup IV*, pages 86–95. Springer, 2001.
- [36] Carlos F Marques and Pedro U Lima. A localization method for a soccer robot using a vision-based omni-directional sensor. In *Robocup 2000: Robot Soccer World Cup IV*, pages 96–107. Springer, 2001.
- [37] Pedro Lima, Andrea Bonarini, Carlos Machado, Fabio Marchese, Carlos Marques, Fernando Ribeiro, and Domenico Sorrenti. Omni-directional catadioptric vision for soccer robots. *Robotics and Autonomous Systems*, 36(2):87–102, 2001.
- [38] Markus Dietl, J-S Gutmann, and Bernhard Nebel. Cooperative sensing in dynamic environments. In *Intelligent Robots and Systems, 2001. Proceedings. 2001 IEEE/RSJ International Conference on*, volume 3, pages 1706–1713. IEEE, 2001.
- [39] Ciprian Candea, Huosheng Hu, Luca Iocchi, Daniele Nardi, and Maurizio Piaggio. Coordination in multi-agent robocup teams. *Robotics and Autonomous Systems*, 36(2):67–86, 2001.
- [40] Ubbo Visser, Christian Drücker, Sebastian Hübner, Esko Schmidt, and Hans-Georg Weland. Recognizing formations in opponent teams. In *RoboCup 2000: Robot Soccer World Cup IV*, pages 391–396. Springer, 2001.
- [41] Hakan Duman and Huosheng Hu. Fuzzy logic for behaviour co-ordination and multi-agent formation in robocup. In *Developments in Soft Computing*, pages 191–198. Springer, 2001.
- [42] Minoru Asada, Andreas Birk, Enrico Pagello, Masahiro Fujita, Itsuki Noda, Satoshi Tadokoro, Dominique Duhaut, Peter Stone, M Veloso, T Balch, et al. Progress in robocup soccer research in 2000. In *Experimental Robotics VII*, pages 363–372. Springer, 2001.
- [43] Philippe Leclercq and Thomas Bräunl. A color segmentation algorithm for real-time object localization on small embedded systems. In *Robot Vision*, pages 69–76. Springer, 2001.
- [44] Giovanni Adorni, Stefano Cagnoni, Stefan Enderle, Gerhard K Kraetzschmar, Monica Mordonini, Michael Plagge, Marcus Ritter, Stefan Sablatnög, and Andreas Zell. Vision-based localization for mobile robots. *Robotics and Autonomous Systems*, 36(2):103–119, 2001.
- [45] Fabio M Marchese and Domenico G Sorrenti. Omni-directional vision with a multi-part mirror. In *RoboCup 2000: Robot Soccer World Cup IV*, pages 179–188. Springer, 2001.

- [46] Thilo Weigel, Jens-Steffen Gutmann, Bernhard Nebel, Klaus Müller, and Markus Dietl. Cs freiburg: Sophisticated skills and effective cooperation. In *Proc. European Control Conference (ECC-01)*, 2001.
- [47] Sebastian Buck, Robert Hanek, and Michael Klupsch. Agilo robocuppers: Robocup team description. In *RoboCup 2000: Robot Soccer World Cup IV*, pages 567–570. Springer, 2001.
- [48] Luigia Carlucci Aiello, Daniele Nardi, and Fiora Pirri. Case studies in cognitive robotics. In *Human and Machine Perception 3*, pages 167–181. Springer, 2001.
- [49] Minoru Asada and Eiji Uchibe. Multiagent learning towards robocup. *New Generation Computing*, 19(2):103–120, 2001.
- [50] Kernel Marko Gutmann, Klaus Miiller, Bernhard Nebel, Boris Szerbakowski, and Maximilian Thiel. Cs freiburg: Doing the right thing in a group? *Robot Soccer World Cup IV:[held from August 27 to September 3, 2000 in Melbourne]*, page 52, 2001.
- [51] José Miguel Almeida, João Paulo Baptista, Alfredo Martins, Eduardo Silva, Luís Lima, António Patacho, Victor Cerqueira, Carlos Almeida, Rui Picas, César Dias, et al. Iseporto team.
- [52] Jerome Douret, Thierry Dorval, Ryad Benosman, Francis Bras, Gael Surtet, Thomas Petit, Nadege Quedec, Denis Philip, Gilles Cordurié, Mario Rebello, et al. Robocup 2000 (f180) team description: Upmc-cfa team (france). In *RoboCup 2000: Robot Soccer World Cup IV*, pages 531–534. Springer, 2001.
- [53] Kosei Demura, Nobuhiro Tachi, Noriharu Kubo, and Kenji Miwa. Winkit. In *RoboCup 2000: Robot Soccer World Cup IV*, pages 571–574. Springer, 2001.
- [54] Raul Rojas, Sven Behnke, Peter Ackers, Bernhard Frotschl, Wolf Linstrot, Manuel de Melo, Andreas Schebesch, Mark Simon, Martin Sprengel, and Oliver Tenchio. The soul of a new machine: The soccer robot team of the fu berlin. *Data Fusion and Perception*, (431):185, 2001.
- [55] Hakan Duman and Huosheng Hu. United we stand, divided we fall. *International Journal of Robotics & Automation*, 16(4):153, 2001.
- [56] Matthijs TJ Spaan, Nikos Vlassis, and Frans CA Groen. High level coordination of agents based on multiagent markov decision processes with roles. In *IROS*, volume 2, pages 66–73, 2002.
- [57] Thorsten Schmitt, Michael Beetz, Robert Hanek, Sebastian Buck, et al. Watch their moves: Applying probabilistic multiple object tracking to autonomous robot soccer. In *AAAI/IAAI*, pages 599–604, 2002.
- [58] Shoichi Ikenoue, Minoru Asada, and Koh Hosoda. Cooperative behavior acquisition by asynchronous policy renewal that enables simultaneous learning in multiagent environment. In *Intelligent Robots and Systems, 2002. IEEE/RSJ International Conference on*, volume 3, pages 2728–2734. IEEE, 2002.
- [59] Markus Dietl, Jens-Steffen Gutmann, and Bernhard Nebel. Cs freiburg: Global view by cooperative sensing. In *RoboCup 2001: Robot Soccer World Cup V*, pages 133–143. Springer, 2002.
- [60] Dirk Stichling and Bernd Kleinjohann. Low latency color segmentation on embedded real-time systems. In *Design and Analysis of Distributed Embedded Systems*, pages 247–256. Springer, 2002.
- [61] Yasutake Takahashi, Takashi Tamura, and Minoru Asada. Strategy learning for a team in adversary environments. In *RoboCup 2001: Robot Soccer World Cup V*, pages 224–233. Springer, 2002.

- [62] Thorsten Schmitt, Robert Hanek, Michael Beetz, Sebastian Buck, and Bernd Radig. Cooperative probabilistic state estimation for vision-based autonomous mobile robots. *Robotics and Automation, IEEE Transactions on*, 18(5):670–684, 2002.
- [63] Thorsten Schmitt, Sebastian Buck, and Michael Beetz. Agilo robocuppers 2001: Utility-and plan-based action selection based on probabilistically estimated game situations. In *RoboCup 2001: Robot Soccer World Cup V*, pages 611–615. Springer, 2002.
- [64] Ansgar Bredendfeld, Vlatko Becanovic, Thomas Christaller, Horst Günther, Giovanni Indiveri, Hans-Ulrich Kobiäka, Paul-Gerhard Plöger, and Peter Schöll. Gmd-robots. In *RoboCup 2001: Robot Soccer World Cup V*, pages 648–652. Springer, 2002.
- [65] Rosemary Emery, Kevin Sikorski, and Tucker Balch. Protocols for collaboration, coordination and dynamic role assignment in a robot team. In *Robotics and Automation, 2002. Proceedings. ICRA '02. IEEE International Conference on*, volume 3, pages 3008–3015. IEEE, 2002.
- [66] Enrico Pagello, M Bert, M Barbon, Emanuele Menegatti, C Moroni, D Spagnoli, S Zaffalon, et al. Artisti veneti: An heterogeneous robot team for the 2001 middle-size league. In *RoboCup 2001: Robot Soccer World Cup V*, pages 616–620. Springer, 2002.
- [67] Hans Utz, Gerd Mayer, Dominik Maschke, Alexander Neubeck, Peter Schaeffer, Philipp Baer, Ingmar Baetge, Jan Fischer, Roland Holzer, Markus Lauer, et al. The ulm sparrows 2001. In *RoboCup 2001: Robot Soccer World Cup V*, pages 677–680. Springer, 2002.
- [68] Matthijs Spaan, Marco Wiering, Robert Bartelds, Raymond Donkervoort, Pieter Jonker, and Frans Groen. Clockwork orange: The dutch robosoccer team. In *RoboCup 2001: Robot Soccer World Cup V*, pages 627–630. Springer, 2002.
- [69] J Almeida, A Martins, and E Silva. Control and localisation for the iseporto robotic soccer team. In *Proc. ICAR 02–International Conf. On Advanced Robotics*, 2002.
- [70] Pedro Lima, Luis Custódio, Bruno Damas, Manuel Lopes, Carlos Marques, Luis Toscano, and Rodrigo Ventura. Isocrob 2001 team description. In *RoboCup 2001: Robot Soccer World Cup V*, pages 653–656. Springer, 2002.
- [71] Emanuele Menegatti and E Pagello. Toward a topological mapping with a multi-robot team. In *University of Padua, Italy, Proceedings Workshop WS7 of*, 2002.
- [72] Fabio M Marchese and Domenico G Sorrenti. Mirror design of a prescribed accuracy omnidirectional vision system. In *Omnidirectional Vision, 2002. Proceedings. Third Workshop on*, pages 136–142. IEEE, 2002.
- [73] Luca Iocchi, Daniele Baldassari, Flavio Cappelli, Alessandro Farinelli, Giorgio Grisetti, Floris Maathuis, and Daniele Nardi. Spqr wheeled team. In *RoboCup 2001: Robot Soccer World Cup V*, pages 669–672. Springer, 2002.
- [74] Vlatko Becanovic, Ansgar Bredendfeld, and Paul G Ploger. Reactive robot control using optical analog vlsi sensors. In *Robotics and Automation, 2002. Proceedings. ICRA '02. IEEE International Conference on*, volume 2, pages 1223–1228. IEEE, 2002.
- [75] Luca Iocchi and Daniele Nardi. Hough localization for mobile robots in polygonal environments. *Robotics and Autonomous Systems*, 40(1):43–58, 2002.
- [76] David Erman. *Design and implementation of an acoustical transmission protocol*. PhD thesis, Masters thesis, Blekinge Institute of Technology, 2002.
- [77] Carlos F Marques and Pedro U Lima. Multi-sensor navigation for soccer robots. In *RoboCup 2001: Robot Soccer World Cup V*, pages 144–153. Springer, 2002.
- [78] Matthijs Spaan. Team play among soccer robots. In *University of Amsterdam*, 2002.

- [79] SCJ Doodeman. A splice oriented design for the clockwork orange robotic soccer team software. 2002.
- [80] Bruno D Damas, Pedro U Lima, and Luis M Custodio. A modified potential fields method for robot navigation applied to dribbling in robotic soccer. In *RoboCup 2002: Robot Soccer World Cup VI*, pages 65–77. Springer, 2003.
- [81] Matthijs TJ Spaan and Frans CA Groen. Team coordination among robotic soccer players. In *RoboCup 2002: Robot Soccer World Cup VI*, pages 409–416. Springer, 2003.
- [82] Junhong Ji, Giovanni Indiveri, P Ploeger, and Ansgar Bredenfeld. An omni-vision based self-localization method for soccer robot. In *Intelligent Vehicles Symposium, 2003. Proceedings. IEEE*, pages 276–281. IEEE, 2003.
- [83] Yasutake Takahashi and Minoru Asada. Multi-layered learning systems for vision-based behavior acquisition of a real mobile robot. In *SICE 2003 Annual Conference*, volume 3, pages 2300–2305. IEEE, 2003.
- [84] Luca Iocchi, Daniele Nardi, Maurizio Piaggio, and Antonio Sgorbissa. Distributed coordination in heterogeneous multi-robot systems. *Autonomous Robots*, 15(2):155–168, 2003.
- [85] Hans Utz, Alexander Neubeck, Gerd Mayer, and Gerhard Kraetzschmar. Improving vision-based self-localization. In *RoboCup 2002: Robot Soccer World Cup VI*, pages 25–40. Springer, 2003.
- [86] Enrico Pagello, Antonio D’Angelo, Carlo Ferrari, Roberto Polesel, Robert Rosati, and Alberto Speranzon. Emergent behaviors of a robot team performing cooperative tasks. *Advanced Robotics*, 17(1):3–19, 2003.
- [87] Weidong Chen, Qixin Cao, Jianqiang Jia, Zhen Luo, Lei Wang, Yongzhi Huang, Nan Luan, Zhuang Fu, Yingjie Sun, Fei Zhang, et al. Jiaolong2003 team description. *RoboCup Soccer Middle-Size League, RoboCup2003, Padua, Italy*, pages 5–9, 2003.
- [88] Alireza Fadaei Tehrani, Hamid Reza Moballegh, Peiman Amini, Amir Abdollahy, Mohsen Amiri, Mohammad Mehdi DaneshPanah, Omid Goodarzi, Masood Gheyntuli, Iraj Hosseini, Hossein Ostadi, et al. Team description: Persia 202003. 2003.
- [89] JM Almeida, A Martins, EP Silva, J Baptista, A Patacho, L Lima, V Cerqueira, C Almeida, and R Picas. Iseporto robotic soccer team for robocup 2003. In *RoboCup 2003 International Symposium, Padua, Italy*, 2003.
- [90] Patrick Heinemann, Michael Plagge, André Treptow, and Andreas Zell. Tracking dynamic objects in a robocup environment-the attempto tübingen robot soccer team. *RoboCup-2003: Robot Soccer World Cup VII, Lecture Notes in Computer Science (CD-Supplement)*. Springer Verlag, 2003.
- [91] Takeshi Matsuoka, Motoki Katoh, Akira Motomura, Kohei Inomata, Nobuhiro Ushimi, Toshihiro Kiriki, Go Hirano, Motoji Yamamoto, Tsutomu Hasegawa, and Akira Mohri. Description of team fusion. *RoboCup-2003: Robot Soccer World Cup VII. Springer-Verlag*, 2003.
- [92] Mansour Jamzad and Abolfazal Keighobadi Lamjiri. Towards an intelligent vision system for mobile robots in robocup environment. In *Intelligent Control. 2003 IEEE International Symposium on*, pages 1012–1017. IEEE, 2003.
- [93] Yasutake Takahashi, Kazuhiro Edazawa, and Minoru Asada. Behavior acquisition based on multi-module learning system in multi-agent environment. In *RoboCup 2002: Robot Soccer World Cup VI*, pages 435–442. Springer, 2003.
- [94] Alireza Fadaei Tehrani, Hamid Reza Moballegh, Mohammad Mehdi DaneshPanah, Peiman Amini, Amir Abdollahi, Mohsen Amiri, Omid Goodarzi, Masood Gheyntuli, Iraj Hosseini, Hossein Ostadi, et al. Persia 2003 team description.

- [95] Andrea Bonarini. Medium size league: 2002 assessment and achievements. In *RoboCup 2002: Robot Soccer World Cup VI*, pages 460–468. Springer, 2003.
- [96] JM Almeida, A Martins, EP Silva, and A Patacho. Vision, localisation and control of the iseporto robotic soccer team.
- [97] Enrico Pagello, Emanuele Menegatti, Tommaso Guseo, Francesco Favaro, and Enrico Ros. Integrating omnidirectional perception and drive in the body of a soccer robot.
- [98] A Bredendfeld, V Becanovic, Th Christaller12, I Godler, M Hülse, G Indiveri, K Ishii, J Ji, HU Kobialka, N Mayer, et al. Team description of ais-musashi 2003.
- [99] Masahiro Maeda, Yasuhisa Mizuta, and Masahiro Takahashi. Project fx team description.
- [100] Emanuele Menegatti, Alberto Scarpa, Dario Massarin, Enrico Ros, and Enrico Pagello. Omnidirectional distributed vision system for a team of heterogeneous robots. In *Computer Vision and Pattern Recognition Workshop, 2003. CVPRW'03. Conference on*, volume 7, pages 87–87. IEEE, 2003.
- [101] Albert Schoute, Mannes Poel, and Ir Ferdi vd Heijden. The development of a vision system for robotic soccer. 2003.
- [102] António Fernando Ribeiro, Paulo Braga, Jorge Monteiro, Ivo Moutinho, Pedro Silva, and Victor Silva. New improvements of minho team for robocup middle size league in 2003. 2004.
- [103] Yingjie Sun, Qixin Cao, and Weidong Chen. An object tracking and global localization method using omnidirectional vision system. In *Intelligent Control and Automation, 2004. WCICA 2004. Fifth World Congress on*, volume 6, pages 4730–4735. IEEE, 2004.
- [104] Artur Merke, Stefan Welker, and Martin Riedmiller. Line based robot localization under natural light conditions. In *European Conference on Artificial Intelligence Machine Learning (ECAI)*, 2004.
- [105] Akira Motomura, Takeshi Matsuoka, and Tsutomu Hasegawa. Self-localization method using two landmarks and dead reckoning for autonomous mobile soccer robots. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 526–533. Springer, 2004.
- [106] António Fernando Ribeiro, Ivo Moutinho, Pedro Silva, Carlos Fraga, and Nino Pereira. Controlling omni-directional wheels of a msl robocup autonomous mobile robot. 2004.
- [107] Gerd Mayer, Hans Utz, and Gerhard K Kraetzschmar. Playing robot soccer under natural light: A case study. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 238–249. Springer, 2004.
- [108] AH Samani, Amir Abdollahi, Hossein Ostadi, and Saeed Ziaee Rad. Design and development of a comprehensive omni directional soccer player robot. *International Journal of Advanced Robotic Systems*, 1(3):191–200, 2004.
- [109] Alexander Ferrein, Christian Fritz, and Gerhard Lakemeyer. On-line decision-theoretic golog for unpredictable domains. In *KI 2004: Advances in Artificial Intelligence*, pages 322–336. Springer, 2004.
- [110] Gerald Steinbauer, Gordon Fraser, Arndt Mühlenfeld, and Franz Wotawa. A modular architecture for a multi-purpose mobile robot. In *Innovations in Applied Artificial Intelligence*, pages 1007–1015. Springer, 2004.
- [111] Wataru Shimizuhira, Kyoko Fujii, and Yoichiro Maeda. Fuzzy behavior control for autonomous mobile robot in dynamic environment with multiple omnidirectional vision system. In *Intelligent Robots and Systems, 2004.(IROS 2004). Proceedings. 2004 IEEE/RSJ International Conference on*, volume 4, pages 3412–3417. IEEE, 2004.

- [112] Pedro Lima, Luis Custodio, P Marcelino, Hugo Costelha, Gonalo Neto, Vasco Pires, Miguel Arroz, and Bob Vecht. Isocrob 2004: Team description paper. In *RoboCup-2004-Proceedings of the International Symposium*, 2004.
- [113] Gonalo Neto, Hugo Costelha, and Pedro Lima. Topological navigation in configuration space applied to soccer robots. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 551–558. Springer, 2004.
- [114] Hans Lausen, Jakob Nielsen, Michael Nielsen, and Pedro Lima. Model and behavior-based robotic goalkeeper. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 169–180. Springer, 2004.
- [115] Yingjie Sun, Qixin Cao, and Jay Lee. Robust mobile robot on-the-fly localization: Using geometrical feature matching method. In *Intelligent Control and Automation, 2004. WCICA 2004. Fifth World Congress on*, volume 6, pages 4749–4753. IEEE, 2004.
- [116] Luis Almeida, Luis Seabra Lopes, P Bartolomeu, E Brito, MB Cunha, JP Figueiredo, P Fonseca, C Lima, R Marau, N Lau, et al. Cambada: Team description paper. In *CD of the Robocup Symposium/TDP*, 2004.
- [117] Huang Yi Cao Qixin. Using 22d laser scanner and omni2directional vision for mobile robot localization. *Journal of Huazhong University of Science and Technology*, 2004.
- [118] Gerald Steinbauer, Christian Deutsch, Gordon Fraser, Matthias Hagler, Arndt Mhlenfeld, Stefan Richter, Gernot Wber, and Jrgen Wolf. Mostly harmless team description 2004. In *Proceedings of the International RoboCup Symposium*, 2004.
- [119] Pieter Jonker, Bas Terwijn, and Bram van Driel. The clockwork orange team 2004. *Proceedings CD RoboCup 2004*, 2004.
- [120] Gordon Fraser, Gerald Steinbauer, Franz Wotawa, et al. Application of qualitative reasoning to robotic soccer. In *18th Int. Workshop on Qualitative Reasoning*, 2004.
- [121] Alireza Fadaei Tehrani, Ali Mohammad Doosthosseini, Hamid Reza Moballegh, Peiman Amini, and Mohammad Mehdi DaneshPanah. A new odometry system to reduce asymmetric errors for omnidirectional mobile robots. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 600–610. Springer, 2004.
- [122] Patrick Heinemann, Andr Treptow, and Andreas Zell. The attempto tbingen robot soccer team, 2004.
- [123] Andrea Bonarini, Matteo Matteucci, and Marcello Restelli. A novel model to rule behavior interaction. In *Proceedings of the 8th Conference on Intelligent Autonomous Systems (IAS-8)*, pages 199–206, 2004.
- [124] Zengrong Zhao, Ru Lai, Hong Huang, and Liyong Bai. How to determine the optimal scoring policy. In *Intelligent Control and Automation, 2004. WCICA 2004. Fifth World Congress on*, volume 1, pages 413–416. IEEE, 2004.
- [125] Ke Wang, Xianjiu Guo, Yan Zhuang, and Wei Wang. Autonomous mobile robot localization based on monocular vision in robocup. In *Intelligent Control and Automation, 2004. WCICA 2004. Fifth World Congress on*, volume 6, pages 4797–4801. IEEE, 2004.
- [126] Andrea Bonarini, Matteo Matteucci, Marcello Restelli, and Domenico Sorrenti. Milan robocup team 2003. In *Proceedings of the 7th Robocup Symposium*, 2004.
- [127] Carlos Marques and Pedro Lima. Avoiding obstacles-multisensor navigation for nonholonomic robots in cluttered environments. *Robotics & Automation Magazine, IEEE*, 11(3):70–82, 2004.

- [128] Carla Penedo, Joao Pavao, Pedro Nunes, and Luis Custódio. Robocup advanced 3d monitor. In *RoboCup 2003: Robot Soccer World Cup VII*, pages 637–644. Springer, 2004.
- [129] Zbigniew Zdziarski. Vision system for an autonomous soccer-playing robot. 2004.
- [130] Pedro U Lima and Luis MM Custodio. Artificial intelligence and systems theory: applied to cooperative robots. *arXiv preprint cs/0411018*, 2004.
- [131] Claudia Gönner, Martin Rous, and Karl-Friedrich Kraiss. Real-time adaptive colour segmentation for the robocup middle size league. In *RoboCup 2004: Robot Soccer World Cup VIII*, pages 402–409. Springer, 2005.
- [132] Wei Liu, Fei Liu, and Zhi-qiang ZHENG. Single viewpoint catadioptric vision for soccer robots [j]. *Computer Simulation*, 11:052, 2005.
- [133] Ying-Jie Ye, Yi-Rung Yang, and TS Li. Full autonomous middle size soccer robot. In *Mechatronics, 2005. ICM'05. IEEE International Conference on*, pages 451–456. IEEE, 2005.
- [134] Gerd Mayer, Ulrich Kaufmann, Gerhard Kraetzschmar, and Günther Palm. Neural robot detection in robocup. In *Biomimetic Neural Learning for Intelligent Robots*, pages 349–361. Springer, 2005.
- [135] Valter Silva, Ricardo Marau, Lius Almeida, Joaquim Ferreira, Mário Calha, Paulo Pedreiras, and José Fonseca. Implementing a distributed sensing and actuation system: The cambada robots case study. In *Emerging Technologies and Factory Automation, 2005. ETFA 2005. 10th IEEE Conference on*, volume 2, pages 8–pp. IEEE, 2005.
- [136] Gordon Fraser and Franz Wotawa. Cooperative planning and plan execution in partially observable dynamic domains. In *RoboCup 2004: Robot Soccer World Cup VIII*, pages 524–531. Springer, 2005.
- [137] Emanuele Menegatti, Alberto Pretto, and Enrico Pagello. A new omnidirectional vision sensor for monte-carlo localization. In *RoboCup 2004: Robot Soccer World Cup VIII*, pages 97–109. Springer, 2005.
- [138] Kuo-Yang Tu. Design and implementation of a cheap middle size soccer robot with wide vision scope for robocup. In *Mechatronics, 2005. ICM'05. IEEE International Conference on*, pages 130–135. IEEE, 2005.
- [139] Hikari Fujii and Kazuo Yoshida. Action control method for mobile robot considering uncertainty of information. In *Intelligent Robots and Systems, 2005.(IROS 2005). 2005 IEEE/RSJ International Conference on*, pages 3915–3920. IEEE, 2005.
- [140] Yoichiro Maeda and Wataru Shimizuhira. Omnidirectional behavior control robot acquired surrounding environment information. In *Systems, Man and Cybernetics, 2005 IEEE International Conference on*, volume 4, pages 3522–3527. IEEE, 2005.
- [141] S Ziaie-Rad, F Janabi-Sharifi, MM Danesh-Panah, A Abdollahi, H Ostadi, and H Samani. A practical approach to control and self-localization of persia omni directional mobile robot. In *Intelligent Robots and Systems, 2005.(IROS 2005). 2005 IEEE/RSJ International Conference on*, pages 3473–3479. IEEE, 2005.
- [142] Pieter Jonker, Bram van Driel, Jev Kuznetsov, and Bas Terwijn. Algorithmic foundation of the clockwork orange robot soccer team. In *Algorithmic Foundations of Robotics VI*, pages 17–26. Springer, 2005.
- [143] Jin-Hui ZHU, Sheng BI, Hua-Qing MIN, and Han-Ru ZHONG. Motion control of robocup middle size soccer robot [j]. *Development & Innovation of Machinery & Electrical Products*, 5:001, 2005.

- [144] Alireza Fadaei Tehrani, Raúl Rojas, Hamid Reza Moballeggh, Iraj Hosseini, and Pooyan Amini. Analysis by synthesis, a novel method in mobile robot self-localization. In *RoboCup 2004: Robot Soccer World Cup VIII*, pages 586–593. Springer, 2005.
- [145] Francesca Calabrese and Giovanni Indiveri. An omni-vision triangulation-like approach to mobile robot localization. In *Intelligent Control, 2005. Proceedings of the 2005 IEEE International Symposium on, Mediterrean Conference on Control and Automation*, pages 604–609. IEEE, 2005.
- [146] Kuo-Yang Tu. Design and implementation of a special catadioptric sensor for a mid-dle-size soccer robot.
- [147] António Fernando Ribeiro, Pedro Silva, Ivo Moutinho, Victor Silva, and Nino Pereira. Optimization of fast moving robots and implementation of i2c protocol to control electronic devices. 2005.
- [148] CJ Zandsteeg and Ir MJG van de Molengraft. Design of a robocup shooting mechanism. *University of Technology Eindhoven*, 2005.
- [149] HJC Luijten. Basics of color based computer vision implemented in matlab. *Technische Universiteit Eindhoven, Department Mechanical Engineering, Dynamics and Control Technology Group, Eindhoven*, pages 1–24, 2005.
- [150] António Fernando Ribeiro, Ivo Moutinho, Pedro Silva, Carlos Fraga, and Nino Pereira. Vision, kinematics and game strategy in multi-robot systems like msl robocup. 2005.
- [151] Ying-Jie Ye Yi-Rung Yang and T-HS Li. full autonomous middle size soccer robot. *Mechatronics*, 901:05, 2005.
- [152] Matthias Salmen and Paul G Ploger. Echo state networks used for motor control. In *Robotics and Automation, 2005. ICRA 2005. Proceedings of the 2005 IEEE International Conference on*, pages 1953–1958. IEEE, 2005.
- [153] Pedro U Lima and Luis MM Custodio. The socrob project: Soccer robots or society of robots. *Cutting Edge Robotics*, pages 417–432, 2005.
- [154] Alexander Ferrein, Lutz Hermanns, and Gerhard Lakemeyer. Comparing sensor fusion techniques for ball position estimation. In *RoboCup 2005: Robot soccer world cup IX*, pages 154–165. Springer, 2006.
- [155] Hikari Fujii, Masayuki Kato, and Kazuo Yoshida. Cooperative action control based on evaluating objective achievements. In *RoboCup 2005: Robot soccer world cup IX*, pages 208–218. Springer, 2006.
- [156] Andreas Strack, Alexander Ferrein, and Gerhard Lakemeyer. Laser-based localization with sparse landmarks. In *RoboCup 2005: Robot soccer world cup IX*, pages 569–576. Springer, 2006.
- [157] Cao Qixin, Huang Yanwen, and Zhou Jingliang. An evolutionary artificial potential field algorithm for dynamic path planning of mobile robot. In *Intelligent Robots and Systems, 2006 IEEE/RSJ International Conference on*, pages 3331–3336. IEEE, 2006.
- [158] Stefan Schiffer, Alexander Ferrein, and Gerhard Lakemeyer. Football is coming home. In *Proceedings of the 2006 international symposium on Practical cognitive agents and robots*, pages 39–50. ACM, 2006.
- [159] Takaaki Ichinose, Yasunori Takemura, Kazuto Azeura, and Ivan Godler. Hibikino-musashi. *RoboCup 2006 Bremen, CD-ROM Proc. of RoboCup 2006*, 2006.

- [160] Stefan Schiffer, Alexander Ferrein, and Gerhard Lakemeyer. Qualitative world models for soccer robots. In *Qualitative Constraint Calculi, Workshop at KI*, volume 2006, pages 3–14, 2006.
- [161] Hui-min LU, Xiang-ke WANG, Fei LIU, Xiu-cai JI, and Zhi-qiang ZHENG. Omni-vision and front vision based object recognition for soccer robots [j]. *Journal of Image and Graphics*, 11:042, 2006.
- [162] Nathan Lovell. Illumination independent object recognition. In *RoboCup 2005: Robot Soccer World Cup IX*, pages 384–395. Springer, 2006.
- [163] Christopher Stanton and Mary-Anne Williams. A novel and practical approach towards color constancy for mobile robots using overlapping color space signatures. In *RoboCup 2005: Robot Soccer World Cup IX*, pages 444–451. Springer, 2006.
- [164] Ruud Tilburgs. Design and realization of a solenoid for a robocup kicking device. *Technische Universiteit Eindhoven, Department of Mechanical Engineering, Control Systems Technology Group*, 2006.
- [165] Julien Beaudry, Julian Choquette, Pierre-Marc Fournier, Louis-Alain Larouche, and François Savard. Robofoot épm team description–robocup2006 middlesize league. Technical report, Technical report, École Polytechnique de Montréal, Canada, 2006.
- [166] Patrick Heinemann, Frank Sehnke, Felix Streichert, and Andreas Zell. An automatic approach to online color training in robocup environments. In *Intelligent Robots and Systems, 2006 IEEE/RSJ International Conference on*, pages 4880–4885. IEEE, 2006.
- [167] Yoichiro Maeda, Satoshi Hanaka, and Wataru Shimizuhira. Multi-layered fuzzy behavior control method for autonomous soccer robot with movis. In *Proceedings of the 3rd International Symposium on Autonomous Minirobots for Research and Edutainment (AMiRE 2005)*, pages 125–132. Springer, 2006.
- [168] Gerald Steinbauer, Martin Mörth, and Franz Wotawa. Real-time diagnosis and repair of faults of robot control software. In *RoboCup 2005: Robot Soccer World Cup IX*, pages 13–23. Springer, 2006.
- [169] Thomas Gabel, Roland Hafner, Sascha Lange, Martin Lauer, and Martin Riedmiller. Bridging the gap: Learning in the robocup simulation and midsize league. In *Proceedings of the 7th Portuguese Conference on Automatic Control*, 2006.
- [170] Toshifumi Kikuchi, Kazunori Umeda, Ryuichi Ueda, Yoshiaki Jitsukawa, Hisashi Osumi, and Tamio Arai. Improvement of color recognition using colored objects. In *RoboCup 2005: Robot Soccer World Cup IX*, pages 537–544. Springer, 2006.
- [171] Enrico Pagello, Antonio D’Angelo, and Emanuele Menegatti. Cooperation issues and distributed sensing for multirobot systems. *Proceedings of the IEEE*, 94(7):1370–1383, 2006.
- [172] Andrea Bonarini, Daniele Lavatelli, and Matteo Matteucci. A composite system for real-time robust whistle recognition. In *RoboCup 2005: Robot Soccer World Cup IX*, pages 130–141. Springer, 2006.
- [173] K Dernura, Y Asano, K Kawarnura, T Takahashi, M Shimizu, M Fujita, H Miyamoto, Y Maeda, S Hanaka, and W Shimizuhira. Robocup real robot. In *Proceedings of the 3rd International Symposium on Autonomous Minirobots for Research and Edutainment (AMiRE 2005)*, page 106. Springer, 2006.
- [174] Jannes Arnold, Ketill Gunnarsson, Raúl Rojas, Fabian Ruff, and Fabian Wiesel. Fu-fighters team description 2006.

- [175] L Almeida, JL Azevedo, G Corrente, MB Cunha, A Ferdowsi, JP Figueiredo, P Fonseca, S Lopes, R Marau, N Lau, et al. Cambada2006: Team description paper. 2006. http://robotica.ua.pt/CAMBADA/docs/qualif2006/CAMBADA2006_tdp.pdf.
- [176] Pedro Lima, Marco Barbosa, João Esteves, Nuno Lopes, Vasco dOrey, and Hugo Pereira. Isocrob-4ll 2006.
- [177] Yasunori TAKEMURA, Amir AF Nassiraei, FAIS RRI, and Kazuo ISHII. Robocup hibikino-musashi .
- [178] Patrick Heinemann, Juergen Haase, and Andreas Zell. A combined monte-carlo localization and tracking algorithm for robocup. In *Intelligent Robots and Systems, 2006 IEEE/RSJ International Conference on*, pages 1535–1540. IEEE, 2006.
- [179] Gerald Steinbauer. *Intelligent and Robust Control of Autonomous Mobile Robots*. PhD thesis, PhD thesis, Institute of Software Technology, Graz University of Technology, Austria, 2006.
- [180] Hikari Fujii, Daiki Sakai, and Kazuo Yoshida. Cooperative control method using evaluation information on objective achievement. In *Distributed Autonomous Robotic Systems 6*, pages 211–220. Springer, 2007.
- [181] Amir Ali Forough Nassiraei, Yasunori Takemura, Atsushi Sanada, Yuichi Kitazumi, Yu Ogawa, Ivan Godler, Kazuo Ishii, Hiroyuki Miyamoto, and Ahmad Ghaderi. Concept of mechatronics modular design for an autonomous mobile soccer robot. In *Computational Intelligence in Robotics and Automation, 2007. CIRA 2007. International Symposium on*, pages 178–183. IEEE, 2007.
- [182] Martin Lauer. Ego-motion estimation and collision detection for omnidirectional robots. In *RoboCup 2006: Robot soccer world cup X*, pages 466–473. Springer, 2007.
- [183] Heiko Müller, Martin Lauer, Roland Hafner, Sascha Lange, Artur Merke, and Martin Riedmiller. Making a robot learn to play soccer using reward and punishment. In *KI 2007: Advances in Artificial Intelligence*, pages 220–234. Springer, 2007.
- [184] Patrick Heinemann, Frank Sehnke, Felix Streichert, and Andreas Zell. Towards a calibration-free robot: The act algorithm for automatic online color training. In *RoboCup 2006: Robot Soccer World Cup X*, pages 363–370. Springer, 2007.
- [185] Hui-min LU, Fei LIU, and Zhi-qiang ZHENG. A novel omni-vision system for soccer robots. *Journal of Image and Graphics*, 7:020, 2007.
- [186] Frans CA Groen, Matthijs TJ Spaan, Jelle R Kok, and Gregor Pavlin. Real world multi-agent systems: information sharing, coordination and planning. In *Logic, Language, and Computation*, pages 154–165. Springer, 2007.
- [187] JL Azevedo, N Lau, G Corrente, A Neves, B Cunha, F Santos, A Pereira, et al. Cambada2007: Team description paper. 2007. http://robotica.ua.pt/CAMBADA/docs/qualif2007/CAMBADA2007_tdp.pdf.
- [188] António JR Neves, Gustavo A Corrente, and Armando J Pinho. An omnidirectional vision system for soccer robots. In *Progress in Artificial Intelligence*, pages 499–507. Springer, 2007.
- [189] Minoru Asada, Tucker Balch, Andrea Bonarini, Ansgar Bredendfeld, Steffen Gutmann, Gerhard Kraetzschmar, Pedro Lima, Emanuele Menegatti, Pieter Jonker, Alireza Fadaei Tehrani, et al. Middle size robot league rules and regulations for 2004, 2007.
- [190] Yasunori Takemura, Atsushi Sanada, Takaaki Ichinose, Yuusuke Nakano, Amir AF Nassiraei, Kazuto Azeura, Yuichi Kitazumi, Yu Ogawa, Ivan Godler, Kazuo Ishii, et al. Development of hibikino-musashi omni-directional mobile robot. In *International Congress Series*, volume 1301, pages 201–205. Elsevier, 2007.

- [191] A DAngelo, E Menegatti, and E Pagello. How a cooperative behavior can emerge from a robot team. In *Distributed Autonomous Robotic Systems 6*, pages 75–84. Springer, 2007.
- [192] Marco Barbosa, Nelson Ramos, and Pedro Lima. Mermaid-multiple-robot middleware for intelligent decision-making. *Proceedings of the 6th IFAC/EURON Sym. Intell. Auton. Vehicles*, pages 3–5, 2007.
- [193] Christian Folkers and Wolfgang Ertel. High performance realtime vision for mobile robots on the gpu. In *VISAPP (Workshop on on Robot Vision)*, pages 27–35, 2007.
- [194] Luis Mota and Luís Paulo Reis. An elementary communication framework for open cooperative robocup soccer teams. In *ICINCO*, pages 9–12, 2007.
- [195] Sascha Lange and Martin Riedmiller. Appearance-based robot discrimination using eigenimages. In *RoboCup 2006: Robot Soccer World Cup X*, pages 499–506. Springer, 2007.
- [196] Harald Burgsteiner, Mark Kröll, Alexander Leopold, and Gerald Steinbauer. Movement prediction from real-world images using a liquid state machine. *Applied Intelligence*, 26(2):99–109, 2007.
- [197] M Jamzad, AR Hadjkhodabakhshi, and VS Mirrokni. Object detection and localization using omnidirectional vision in the robocup environment. *Scientia Iranica*, 14(6):599–611, 2007.
- [198] Luca Iocchi, Luca Marchetti, D Nardi, Pedro Lima, Marco Barbosa, Hugo Pereira, and Nuno Lopes. Spqr+ isocrob robocup 2007 qualification report. Technical report, Technical report, Sapienza Università di Roma, Italy, 2007.
- [199] Xiang Li and Andreas Zell. H filtering for a mobile robot tracking a free rolling ball. In *RoboCup 2006: Robot Soccer World Cup X*, pages 296–303. Springer, 2007.
- [200] Dennis Bruijnen, WHTM Aangenent, Jeroen van Helvoort, and René van de Molengraft. From vision to realtime motion control for the robocup domain. In *Control Applications, 2007. CCA 2007. IEEE International Conference on*, pages 545–550. IEEE, 2007.
- [201] Thomas Wisspeintner and W Novak. Volksbot-a construction kit for multi-purpose robot prototyping. 2007.
- [202] Rob Hoogendijk, MJG van de Molengraft, WHTM Aangenent, and RJE Merry. *Design of a ball handling mechanism for robocup*. PhD thesis, Masters thesis, Technische Universiteit Eindhoven, 2007.
- [203] Nelson Ramos, Marco Barbosa, and P Lima. Multi-robot systems middleware applied to soccer robots. *ROBOTICA*, 2007.
- [204] Qixin Cao, Yanwen Huang, and Chuntao Leng. An amendatory dynamic model with slip for four-wheeled omnidirectional mobile robot. In *International Workshop and Conference on Photonics and Nanotechnology 2007*, pages 67945G–67945G. International Society for Optics and Photonics, 2007.
- [205] Patrick Heinemann, Hannes Becker, Jürgen Haase, and Andreas Zell. The attempto tübingen robot soccer team 2006. *Robot Soccer World Cup X*, 2007.
- [206] Walter Nisticò, Matthias Hebbel, Thorsten Kerkhof, and Christine Zarges. Cooperative visual tracking in a team of autonomous mobile robots. In *RoboCup 2006: Robot Soccer World Cup X*, pages 146–157. Springer, 2007.
- [207] Yasunori Takemura, Amir AF Nassiraei, and Kazuo Ishii. Concept of mechatronics modular design for an autonomous mobile soccer robot. In *International Symposium on Computational Intelligence in Robotics and Automation, CIRA*, 2007.

- [208] Qicheng He, Yimin Yang, Xuexi Zhang, and Yanbiao Huang. Local mapping for the middle-size league of robocup. In *International Symposium on Multispectral Image Processing and Pattern Recognition*, pages 67862C–67862C. International Society for Optics and Photonics, 2007.
- [209] Akihiro Matsumoto, Toshinari Akimoto, Hiroaki Nishigori, Hideaki Shimizu, Kaname Kanamoto, Hiroki Maeda, Yuji Takahashi, and Takashi Ogino. The orient 2007: Team description paper.
- [210] Daniel Beck, Martin Buchleitner, Alexander Ferrein, Tim Niemüller, and Gerald Steinbauer. Mostly harmless & allemaniacsmixed innovations.
- [211] Yoichiro Maeda and Daisuke Idou. Multiple omnidirectional vision system and its self-localization experiment. In *Fuzzy Systems Conference, 2007. FUZZ-IEEE 2007. IEEE International*, pages 1–6. IEEE, 2007.
- [212] Joao Gonçalo Delgado Torres Torres. Relational behaviors for soccer robots.
- [213] Yanbiao Huang, Yimin Yang, Qicheng He, and Xuexi Zhang. Research of robot simultaneous localization and mapping in multiple mobile robot system. In *International Symposium on Multispectral Image Processing and Pattern Recognition*, pages 67862B–67862B. International Society for Optics and Photonics, 2007.
- [214] António Fernando Ribeiro, Nino Pereira, João Silva, Marco Ferreira, and Tomé Silva. Optimized robot strategy, ball filters and new referee whistle hardware filter. 2007.
- [215] Yoichiro Maeda. Multiple omnidirectional vision system and multilayered fuzzy behavior control for autonomous mobile robot.
- [216] Xiang Li, Maosen Wang, and Andreas Zell. Dribbling control of omnidirectional soccer robots. In *Robotics and Automation, 2007 IEEE International Conference on*, pages 2623–2628. IEEE, 2007.
- [217] Hans-Dieter Burkhard and Ralf Berger. Cases in robotic soccer. In *Case-Based Reasoning Research and Development*, pages 1–15. Springer, 2007.
- [218] José Luís Azevedo, Bernardo Cunha, and Luís Almeida. In *Emerging Technologies and Factory Automation, 2007. ETFA. IEEE Conference on*.
- [219] Correlatore Esterno and Alexandre Bernardino. 3d model-based tracking with one omnidirectional camera and particle filters.
- [220] Patrick Heinemann, Jürgen Haase, and Andreas Zell. A novel approach to efficient monte-carlo localization in robocup. In *RoboCup 2006: Robot Soccer World Cup X*, pages 322–329. Springer, 2007.
- [221] QICHENG HE, YIMIN YANG, XUEXI ZHANG, and YANBIAO HUANG. Lilocal mapping for middle-size league of robocup. In *Proceedings of SPIE, the International Society for Optical Engineering*, pages 67862C–1. Society of Photo-Optical Instrumentation Engineers, 2007.
- [222] Andrea Bonarini, Matteo Matteucci, and Marcello Restelli. Mrt: Robotics off-the-shelf with the modular robotic toolkit. In *Software Engineering for Experimental Robotics*, pages 345–364. Springer, 2007.
- [223] Stoyan Hristov Georgiev. *Teaching through demonstration of a RoboCup goalkeeper robot*. PhD thesis, University of Applied Sciences, 2007.
- [224] Philipp A Baer and Roland Reichle. Communication and collaboration in heterogeneous teams of soccer robots. *I-Tech Education and Publishing, Wien/Austria*, 2007.

- [225] Roland Hafner, Sascha Lange, Martin Lauer, and Martin Riedmiller. Brainstormers tribots team description. In *RoboCup International Symposium*, 2008.
- [226] António JR Neves, Daniel A Martins, and Armando J Pinho. A hybrid vision system for soccer robots using radial search lines. In *Proc. of the 8th Conference on Autonomous Robot Systems and Competitions, Portuguese Robotics Open-ROBOTICA*, pages 51–55, 2008.
- [227] Daniel Beck, Alexander Ferrein, and Gerhard Lakemeyer. A simulation environment for middle-size robots with multi-level abstraction. In *RoboCup 2007: Robot Soccer World Cup XI*, pages 136–147. Springer, 2008.
- [228] Nuno Lau, L Seabra Lopes, and Gustavo Corrente. Cambada: information sharing and team coordination. In *Proc. of the 8th Conference on Autonomous Robot Systems and Competitions, Portuguese Robotics Open-ROBOTICA*, pages 27–32, 2008.
- [229] Huimin Lu, Zhiqiang Zheng, Fei Liu, and Xiangke Wang. A robust object recognition method for soccer robots. In *Intelligent Control and Automation, 2008. WCICA 2008. 7th World Congress on*, pages 1645–1650. IEEE, 2008.
- [230] Hugo Silva, JM Almeida, L Lima, Alfredo Martins, and EP Silva. A real time vision system for autonomous systems: Characterization during a middle size match. In *RoboCup 2007: Robot Soccer World Cup XI*, pages 504–511. Springer, 2008.
- [231] Daniel A Martins, António JR Neves, and Armando J Pinho. Real-time generic ball recognition in robocup domain. In *Proc. of the 3rd International Workshop on Intelligent Robotics, IROBOT*, pages 37–48, 2008.
- [232] Martin Riedmiller, Roland Hafner, Sascha Lange, and Martin Lauer. Learning to dribble on a real robot by success and failure. In *Robotics and Automation, 2008. ICRA 2008. IEEE International Conference on*, pages 2207–2208. IEEE, 2008.
- [233] JJM Lunenburg and GVD Ven. Tech united team description. *Proceedings of the RoboCup*, 2008.
- [234] Ahmad Ghaderi, Atsushi Sanada, Amir AF Nassiraei, Kazuo Ishii, and Ivan Godler. Power and propulsion systems design for an autonomous omni-directional mobile robot. In *Applied Power Electronics Conference and Exposition, 2008. APEC 2008. Twenty-Third Annual IEEE*, pages 267–272. IEEE, 2008.
- [235] Alexander Ferrein and Gerhard Lakemeyer. Logic-based robot control in highly dynamic domains. *Robotics and Autonomous Systems*, 56(11):980–991, 2008.
- [236] F Dylla, A Ferrein, G Lakemeyer, J Murray, O Obst, T Röfer, S Schiffer, F Stolzenburg, U Visser, and Th Wagner. Approaching a formal soccer theory from behaviour specifications in robotic soccer. *Computers in Sport*, pages 161–185, 2008.
- [237] Joao Silva, Nuno Lau, Joao Rodrigues, and José Luis Azevedo. Ball sensor fusion and ball interception behaviours for a robotic soccer team. In *Proc. of the 11th edition of the Ibero-American Conference on Artificial Intelligence, IBERAMIA*, pages 25–36, 2008.
- [238] JL Azevedo, N Lau, G Corrente, A Neves, B Cunha, F Santos, A Pereira, et al. Cambada2008: Team description paper. 2008. http://robotica.ua.pt/CAMBADA/docs/qualif2008/CAMBADA2008_tdp.pdf.
- [239] Matteo Taiana, José Gaspar, Jacinto Nascimento, Alexandre Bernardino, and Pedro Lima. 3d tracking by catadioptric vision based on particle filters. In *RoboCup 2007: Robot soccer world cup XI*, pages 77–88. Springer, 2008.
- [240] Liudong Qiu and Zushu Li. A fast component labeling and description algorithm for robocup middle-size league. In *Intelligent Control and Automation, 2008. WCICA 2008. 7th World Congress on*, pages 6575–6579. IEEE, 2008.

- [241] Yasunori Takemura, Yu Ogawa, Amir AF Nassiraei, Atsushi Sanada, Yuichi Kitazumi, Ivan Godler, Kazuo Ishii, and Hiroyuki Miyamoto. A system design concept based on omnidirectional mobility, safety and modularity for an autonomous mobile soccer robot. *Journal of Bionic Engineering*, 5:121–129, 2008.
- [242] João Messias, João Santos, João Estilita, and Pedro Lima. Monte carlo localization based on gyrodometry and line-detection. In *ROBOTICA2008, 8th Conference on Mobile Robots and Competitions*, 2008.
- [243] Fei LIU, Hui-min LU, and Zhi-qiang ZHENG. Linear classifiers based clut classifying method in combined color space [j]. *Journal of Image and Graphics*, 1:022, 2008.
- [244] Xiang Li and Andreas Zell. Nonlinear predictive control of an omnidirectional robot dribbling a rolling ball. In *Robotics and Automation, 2008. ICRA 2008. IEEE International Conference on*, pages 1678–1683. IEEE, 2008.
- [245] Benoit Bouchard, Dominic Lapensée, Marc Lauzon, Simon Pelletier-Thibault, Jean-Christophe Roy, and Guillaume Scott. Robofoot épm team description paper 2008. Technical report, Technical report, Mechatronics Laboratory, 2008.
- [246] Xu Daohao Ding Yongqian. Application of digital compass in the goalkeeper pose control of robot soccer [j]. *Foreign Electronic Measurement Technology*, 10:020, 2008.
- [247] Alireza Khashanipour, Amir Reza Khashanipour, Nargess Shamshiri Milani, Peyman Akhlaghi, and Kaveh Khezri Boukani. Robust color classification using fuzzy reasoning and genetic algorithms in robocup soccer leagues. In *RoboCup 2007: Robot Soccer World Cup XI*, pages 548–555. Springer, 2008.
- [248] Yasunori Takemura, Yu Ogawa, Amir Ali Forough Nassiraei, Atsushi Sanada, Yuichi Kitazumi, Ivan Godler, Kazuo Ishii, Hiroyuki Miyamoto, and Ahmad Ghaderi. Concept of mechatronics safety and modularity design for an autonomous mobile soccer robot. In *Intelligent Robots and Systems, 2008. IROS 2008. IEEE/RSJ International Conference on*, pages 3686–3691. IEEE, 2008.
- [249] Yasunori Takemura and Kazuo Ishii. Color constancy algorithm using som for autonomous soccer robots.
- [250] Luis Mota. *A Common Framework for Co-operative Robotics: Applications in RoboCup-Thesis project*. PhD thesis, 2008.
- [251] Tomoharu Shimizu, Keita Morisaki, Takafumi Suzuki, Nanase Tomoyasu, M Takahashi, and Kazuo Yoshida. Eigen keio univ. team description. In *RoboCup International Symposium*, 2008.
- [252] Fernando Ribeiro, Ivo Moutinho, Nino Pereira, Fernando Oliveira, José Fernandes, Nuno Peixoto, and Antero Salgado. High accuracy navigation in unknown environment using adaptive control. In *RoboCup 2007: Robot Soccer World Cup XI*, pages 312–319. Springer, 2008.
- [253] Sameh Gobriel, Robert Cleric, and Daniel Mosse. Adaptations of tdma scheduling for wireless sensor networks. In *Proceedings of the 7th International Workshop on Real-Time Networks (RTN)*, 2008.
- [254] Yasutake Takahashi, Kentaro Noma, and Minoru Asada. Efficient behavior learning based on state value estimation of self and others. *Advanced Robotics*, 22(12):1379–1395, 2008.
- [255] Daniel Filipe de Almeida Martins. Image processing system for robotic applications. Master’s thesis, 2008.

- [256] Cao Qixin, Huang Yanwen, and Leng Chuntao. An amendatory dynamic model with slip for four-wheeled omni-directional mobile robot. In *Proceedings of SPIE, the International Society for Optical Engineering*, pages 67945G–1. Society of Photo-Optical Instrumentation Engineers, 2008.
- [257] Vidar Holen and Audun Marøy. Learning robot soccer with uct. 2008.
- [258] M Taiana, J Santos, J Gaspar, J Nascimento, A Bernardino, and P Lima. Color 3d model-based tracking with arbitrary projection models. In *SIMPAR Omnidirectional Vision Workshop*, 2008.
- [259] Matteo Taiana, Jacinto C Nascimento, José António Gaspar, and Alexandre Bernardino. Sample-based 3d tracking of colored objects: A flexible architecture. In *BMVC*, pages 1–10, 2008.
- [260] Narges Shamshiri Milani, Alireza Kashanipour, and Amir Reza Kashanipour. Evolving fuzzy classifier system using pso for robocup vision applications. In *Genetic and Evolving Systems, 2008. GEFS 2008. 3rd International Workshop on*, pages 17–22. IEEE, 2008.
- [261] Charles Craft, Mark Macki, Francois Mikobi, Landry Nzudie, and Miguel Tostado. Kicking mechanism for the pioneer 3-dx. 2008.
- [262] João Manuel Leite da Silva et al. Sensor fusion and behaviours for the cambada robotic soccer team. Master’s thesis, 2008.
- [263] Artur Faria and Pedro Lima. Development and analysis of relational behaviors in soccer robots. 2008.
- [264] Bernardo Cunha, José Azevedo, Nuno Lau, and Luis Almeida. Obtaining the inverse distance map from a non-svp hyperbolic catadioptric robotic vision system. In *RoboCup 2007: Robot Soccer World Cup XI*, pages 417–424. Springer, 2008.
- [265] AS Conceao, A Paulo Moreira, and Paulo J Costa. Design of a mobile robot for robocup middle size league. In *Robotics Symposium (LARS), 2009 6th Latin American*, pages 1–6. IEEE, 2009.
- [266] Huimin Lu, Hui Zhang, Junhao Xiao, Fei Liu, and Zhiqiang Zheng. Arbitrary ball recognition based on omni-directional vision for soccer robots. In *RoboCup 2008: Robot Soccer World Cup XII*, pages 133–144. Springer, 2009.
- [267] Nau Lau, Luís Seabra Lopes, Gustavo Corrente, and Nelson Filipe. Multi-robot team coordination through roles, positionings and coordinated procedures. In *Intelligent Robots and Systems, 2009. IROS 2009. IEEE/RSJ International Conference on*, pages 5841–5848. IEEE, 2009.
- [268] Kiattisin Kanjanawanishkul and Andreas Zell. Path following for an omnidirectional mobile robot based on model predictive control. In *Robotics and Automation, 2009. ICRA '09. IEEE International Conference on*, pages 3341–3346. IEEE, 2009.
- [269] WHTM Aangenent, JJTH de Best, BHM Bukkems, FMW Kanters, KJ Meessen, JJPA Willems, RJE Merry, and MJG vd Molengraft. Tech united eindhoven team description 2009. In *CD proceedings of RoboCup 2009 symposium*, 2009.
- [270] JL Azevedo, MB Cunha, N Lau, A Neves, G Corrente, F Santos, A Pereira, L Almeida, LS Lopes, P Pedreiras, et al. Cambada’2009: Team description paper. In *CD proceedings of RoboCup 2009 Symposium*, 2009.

- [271] Marco Barbosa, Alexandre Bernardino, Dario Figueira, José Gaspar, Nelson Gonçalves, Pedro U Lima, Plinio Moreno, Abdolkarim Pahlani, José Santos-Victor, Matthijs TJ Spaan, et al. Isrobotnet: A testbed for sensor and robot network systems. In *Intelligent Robots and Systems, 2009. IROS 2009. IEEE/RSJ International Conference on*, pages 2827–2833. IEEE, 2009.
- [272] SHM Kasaei, SMM Kasaei, SA Kasaei, M Taheri, H Vahiddastjerdi, and M Rahimi. Effective mechatronic models and methods for implementation an autonomous soccer robot. 2009.
- [273] António JR Neves, Bernardo Cunha, Armando J Pinho, and Ivo Pinheiro. Autonomous configuration of parameters in robotic digital cameras. In *Pattern Recognition and Image Analysis*, pages 80–87. Springer, 2009.
- [274] Huimin Lu, Hui Zhang, Shaowu Yang, and Zhiqiang Zheng. Vision-based ball recognition for soccer robots without color classification. In *Information and Automation, 2009. ICIA '09. International Conference on*, pages 916–921. IEEE, 2009.
- [275] Nuno Lau, Luís Seabra Lopes, Nelson Filipe, and Gustavo Corrente. Roles, positionings and set plays to coordinate a robocup msl team. In *Progress in Artificial Intelligence*, pages 323–337. Springer, 2009.
- [276] Joao Silva, António JR Neves, and Nuno Lau. Identifying obstacles in the robocup middle size league. In *Proc. of the 15th Portuguese Conf. on Pattern Recognition, RECPAD*, 2009.
- [277] Joao Silva, Nuno Lau, António JR Neves, Joao Rodrigues, and José Luís Azevedo. Obstacle detection, identification and sharing on a robotic soccer team. In *Progress in Artificial Intelligence*, pages 350–360. Springer, 2009.
- [278] Xiang Li and Andreas Zell. Motion control of an omnidirectional mobile robot. In *Informatics in Control, Automation and Robotics*, pages 181–193. Springer, 2009.
- [279] Daniel Beck and Tim Niemueller. Allemaniacs 2009 team description. *RoboCup Middle Size League (MSL)*, 2009.
- [280] Frederico Santos, Lus Almeida, Paulo Pedreiras, and Lus Seabra Lopes. A real-time distributed software infrastructure for cooperating mobile autonomous robots. In *Advanced Robotics, 2009. ICAR 2009. International Conference on*, pages 1–6. IEEE, 2009.
- [281] Andreas Koch, Adam Berthelot, Bernd Eckstein, Oliver Zweigle, Kai Häussermann, Uwe-Philipp Käppeler, Andreas Tamke, Hamid Rajaei, and Paul Levi. Advanced data logging in robocup. In *Autonome Mobile Systeme 2009*, pages 1–8. Springer, 2009.
- [282] Nuno M Figueiredo, António JR Neves, Nuno Lau, Artur Pereira, and Gustavo Corrente. Control and monitoring of a robotic soccer team: The base station application. In *Progress in Artificial Intelligence*, pages 299–309. Springer, 2009.
- [283] Oliver Birbach, Jörg Kurlbaum, Tim Laue, and Udo Frese. Tracking of ball trajectories with a free moving camera-inertial sensor. In *RoboCup 2008: Robot Soccer World Cup XII*, pages 49–60. Springer, 2009.
- [284] Daniel Beck, Alexander Ferrein, and Gerhard Lakemeyer. Landmark-based representations for navigating holonomic soccer robots. In *RoboCup 2008: Robot Soccer World Cup XII*, pages 25–36. Springer, 2009.
- [285] XIE Li-xun YANG Yi-min. Color image segmentation based on improved region growing algorithm [j]. *Microcomputer Information*, 18:134, 2009.
- [286] Yuichi Kitazumi, Shuichi Ishida, Yu Ogawa, Kota Yamada, Yusuke Sato, Mariko Oki, Hiroshi Thoriyama, Noriyuki Shinpuku, Yasunori Takemura, A Nassiraei, et al. Hibikino-musashi team description paper. In *Robocup 2009 International Symposium*, 2009.

- [287] José Almeida, Alfredo Martins, Eduardo Silva, Luis Lima, Carlos Almeida, Nuno Dias, André Dias, and Hugo Silva. Iseporto robotic soccer team for robocup 2009: Improving perception., 2009.
- [288] Saeed Ebrahimijam, M Montazeri, S Moein, H Rasamfard, and M Hosseini. Analyzing the effect of developing emotional intelligence on soccer robot behaviors. In *Mechatronics and its Applications, 2009. ISMA'09. 6th International Symposium on*, pages 1–5. IEEE, 2009.
- [289] Stephan Opfer and Dipl-Inf Michael Wagner. Efficient decision making in alic. *Not published yet*, 2009.
- [290] António JR Neves, Daniel A Martins, and Armando J Pinho. Obtaining the distance map for perspective vision systems. In *Proc. of the ECCOMAS Thematic Conference on Computational Vision and Medical Image Processing*, 2009.
- [291] Joao Cunha, Nuno Lau, Joao Rodrigues, Bernardo Cunha, and José Luis Azevedo. Predictive control for behavior generation of omni-directional robots. In *Progress in Artificial Intelligence*, pages 275–286. Springer, 2009.
- [292] Yasunori Takemura and Kazuo Ishii. Evaluation of color constancy vision algorithm for mobile robots. In *Neural Information Processing*, pages 409–419. Springer, 2009.
- [293] Amir AF Nassiraei and Kazuo Ishii. How does intelligent mechanical design concept help us to enhance robots function? In *Intelligent Unmanned Systems: Theory and Applications*, pages 155–178. Springer, 2009.
- [294] Ricardo Peixinho Sequeira. Startegic coordination of cambada robotic soccer team. Master's thesis, 2009.
- [295] DENG Ben-zai, LI Gen, HUANG Miao, WANG Guo-wei, and ZHANG Fei. Dynamic formation selecting in the middle-size league of robocup. 2009.
- [296] Omid Sojodishijani, Saeed Ebrahimijam, and Vahid Rostami. Localization by dkf multi sensor fusion in the uncertain environments for mobile robot.
- [297] NIU Jie DAI Yan. A robust object recognition method for robocup soccer robots. *Journal of Changzhou Vocational College of Information Technology*, 5:007, 2009.
- [298] Zhang Shunxin, Lin Xiaoyuan, Fan Haiting, Xiang Zongjie, and Chen Wanmi. Shu strive legends team description 2009.
- [299] K Kohta and S Hidekazu. Visual servoing for soccer robot using optz (omni-directional pan-tilt-zoom camera). In *Information Engineering and Computer Science, 2009. ICIECS 2009. International Conference on*, pages 1–4. IEEE, 2009.
- [300] Kazuma Hosokawa, Kenji Ishida, Yusuke Okuda, Shuji Ichikawa, Hidenari Kobayasi, Shohei Takesako, Yasuki Asano, and Kosei Demura. Sitik kit.
- [301] Fu Gen-ping and Yang Yi-min. Motion control system based on dspic for omni-directional soccer robots [j]. *Journal of Guangdong University of Technology*, 2:015, 2009.
- [302] Zhu Jinhui, Zheng Qilun, Liang Yingju, Liang Mingjie, and Min Huaqing. A component-based hybrid testbed for multi-mobile robots. In *Information and Automation, 2009. ICIA'09. International Conference on*, pages 905–909. IEEE, 2009.
- [303] Yasunori Takemura and Kazuo Ishii. Development of the color constancy vision algorithms using bio-inspired information processing. In *Systems, Man and Cybernetics, 2009. SMC 2009. IEEE International Conference on*, pages 1746–1751. IEEE, 2009.
- [304] Kasaei S Hamidreza, Kasaei S Mohammadreza, Kasaei S Alireza, and Taheri Mohsen. Dynamic role engine and formation control for cooperating agents. 2009.

- [305] Deng Ben-zai, Huang Miao, Xie Zhi-cheng, Li Gen, and Zhang Fei. The study of self-localization method based on omni-direction vision. *Computing Technology and Automation*, 4:027, 2009.
- [306] Kasaei S Hamidreza, Kasaei S Mohammadreza, Kasaei S Alireza, and Taheri Mohsen. Modeling and implementation of omni-directional soccer robot with wide vision scope applied in robocup-msl. 2009.
- [307] Bruno MM Ribeiro, Daniel A Martins, António JR Neves, and Armando J Pinho. Arbitrary ball detection using the circular hough transform. In *Proc. of the 15th Portuguese Conf. on Pattern Recognition, RECPAD*, 2009.
- [308] M Taheri, SH Mohades Kasaei, SA Monajemi, SM Mohades Kasaei, H Vahiddastjerdi, and M Rahimi. Team description paper of adro 2009.
- [309] Robert Unterberger Steinbauer and Franz Wotawa. Mostly harmless: Team description paper 2009.
- [310] M Barbosa, P Lima, and J Sequeira. Middleware for multiple robot intelligent decision-making.
- [311] Norman Weiss. Adaptive supervision of moving objects for mobile robotics applications. *Robotics and Autonomous Systems*, 57(10):982–995, 2009.
- [312] João Alexandre da Silva Costa Cunha et al. Holonomic control and behaviours for the cambada robotic soccer team. Master’s thesis, 2009.
- [313] Martin Riedmiller, Thomas Gabel, Roland Hafner, and Sascha Lange. Reinforcement learning for robot soccer. *Autonomous Robots*, 27(1):55–73, 2009.
- [314] Stefan Triller, Albert Zündorf, and Dipl-Inf Hendrik Skubch. A cooperative behaviour model for autonomous robots in dynamic domains. *Noch nicht erschienen*, 2009.
- [315] José Ricardo Marques de Oliveira. World representation for an autonomous driving robot. Master’s thesis, 2009.
- [316] Aleix Mercader Pallarés. Goal detection for soccer-playing robots based on hough transform.
- [317] Bruno Miguel Marques Ribeiro. Object detection in robotics using morphological information. Master’s thesis, 2009.
- [318] Sander van Dijk. *Practical Hierarchical Reinforcement Learning in Continuous Domains*. PhD thesis, University of Groningen, 2009.
- [319] Muhammad Usman Karim Khan. Real time line feature extraction: Design and implementation. 2009.
- [320] Josh Apple, Torrey Frank, Matthew Saylor, and Ted Siegel. A soccer playing robot. 2009.
- [321] Frederico Santos, Luís Almeida, Luis Seabra Lopes, José Luís Azevedo, and M Bernardo Cunha. Communicating among robots in the robocup middle-size league. In *RoboCup 2009: Robot Soccer World Cup XIII*, pages 320–331. Springer, 2010.
- [322] Y Kitazumi and K Ishii. Survey of cooperative algorithm in robocup middle size league. In *World Automation Congress (WAC), 2010*, pages 1–6. IEEE, 2010.
- [323] Alexander Ferrein. Robot controllers for highly dynamic environments with real-time constraints. *KI-Künstliche Intelligenz*, 24(2):175–178, 2010.
- [324] Joao Silva, Nuno Lau, Joao Rodrigues, José Luís Azevedo, and António JR Neves. Sensor and information fusion applied to a robotic soccer team. In *RoboCup 2009: Robot soccer world cup XIII*, pages 366–377. Springer, 2010.

- [325] S Hamidreza Kasaei, S Mohammadreza Kasaei, S Alireza Kasaei, S Amir Hassan Monadjemi, and Mohsen Taheri. Modeling and implementation of a fully autonomous soccer robot based on omni-directional vision system. *Industrial Robot: An International Journal*, 37(3):279–286, 2010.
- [326] Xin Luan, Weiwei Qi, Dalei Song, Ming Chen, Tieyi Zhu, and Li Wang. Illumination invariant color model for object recognition in robot soccer. In *Advances in Swarm Intelligence*, pages 680–687. Springer, 2010.
- [327] João Santos and Pedro Lima. Multi-robot cooperative object localization. In *RoboCup 2009: Robot Soccer World Cup XIII*, pages 332–343. Springer, 2010.
- [328] Huimin Lu, Hui Zhang, Shaowu Yang, and Zhiqiang Zheng. A robust self-localization method based on omnidirectional vision for soccer robots [j]. *Robot*, 4:018, 2010.
- [329] Huimin Lu, Hui Zhang, Shaowu Yang, and Zhiqiang Zheng. A novel camera parameters auto-adjusting method based on image entropy. In *RoboCup 2009: Robot Soccer World Cup XIII*, pages 192–203. Springer, 2010.
- [330] Alexander Fabisch, Tim Laue, and Thomas Röfer. Robot recognition and modeling in the robocup standard platform league. In *Proc. 5th Workshop on Humanoid Soccer Robots at Humanoids*, 2010.
- [331] AJR Neves, JL Azevedo, MB Cunha, N Lau, A Pereira, G Corrente, F Santos, D Martins, N Figueiredo, J Silva, et al. Cambada2010: Team description paper. *Proceedings Robocup 2010*, 2010.
- [332] Alessandro Farinelli, Hikari Fujii, Nanase Tomoyasu, Masaki Takahashi, Antonio D’Angelo, and Enrico Pagello. Cooperative control through objective achievement. *Robotics and Autonomous Systems*, 58(7):910–920, 2010.
- [333] Wentao Yu, Huimin Lu, Shengcai Lu, Shaowu Yang, Peng Dong, Shaoke Qian, Dengke Zhu, Shuai Tang, Zhiwen Zeng, Hui Zhang, et al. Nubot team description paper 2010. *Proceedings of the RoboCup*, 2010.
- [334] JJTH de Best, DJH Bruijnen, R Hoogendijk, RJM Janssen, KJ Meessen, RJE Merry, MJG van de Molengraft, GJL Naus, and MJC Ronde. Tech united eindhoven team description 2010, 2010.
- [335] Xiangke Wang, Hui Zhang, Huimin Lu, and Zhiqiang Zheng. A new triple-based multi-robot system architecture and application in soccer robots. In *Intelligent Robotics and Applications*, pages 105–115. Springer, 2010.
- [336] S Hamidreza Mohades Kasaei, S Mohammadreza Mohades Kasaei, S Alireza Mohades Kasaei, and Mohsen Taheri. Design of an action selection mechanism for cooperative soccer robots based on fuzzy decision making algorithm. *BRAIN. Broad Research in Artificial Intelligence and Neuroscience*, 1(3):pp–5, 2010.
- [337] Xuexi Zhang, Yimin Yang, Rundan Liu, and Runing Liu. Design and realization of the hybrid vision system for autonomous soccer robot [j]. *Robot*, 3:014, 2010.
- [338] UP Käppeler, O Zweigle, H Rajaie, K Häussermann, A Tamke, A Koch, B Eckstein, F Aichele, D DiMarco, A Berthelot, et al. 1. rfc stuttgart team description 2010. *RoboCup Team Description Papers*, 2010.
- [339] Harald Altinger, Stefan J Galler, Stephan Mühlbacher-Karrer, Gerald Steinbauer, Franz Wotawa, and Hubert Zangl. Concept evaluation of a reflex inspired ball handling device for autonomous soccer robots. In *RoboCup 2009: Robot Soccer World Cup XIII*, pages 11–22. Springer, 2010.

- [340] S Hamidreza Mohades Kasaei, S Mohammadreza Mohades Kasaei, and S Alireza Mohades Kasaei. Development a real time cooperative behavior approach for autonomous soccer robots applied in robocup-msl. *International Journal of Robotics and Automation (IJRA)*, 1(2):26.
- [341] Kazuo Yoshida. Challenge: Concept of system life and its application to robotics. *Robotics and Autonomous Systems*, 58(7):833–839, 2010.
- [342] S Hamidreza Mohades Kasaei, S Mohammadreza Mohades Kasaei, SA Monadjemi, and Mohsen Taheri. Modeling and implementation of omnidirectional soccer robot with wide vision scope applied in robocup-msl. *BRAIN. Broad Research in Artificial Intelligence and Neuroscience*, 1(3):pp–65, 2010.
- [343] Shaoxing Su, Zhiyang Gu, Xiangjiao Chen, Lingjiao Dong, Yantai Huang, Xiaokang Song, and Li Wu. Endeavor team description paper 2010.
- [344] Mohades Kasaei, Mohades Kasaei, and Mohades Kasaei. Development a real-time cooperative approach for autonomous soccer robots based on world model information. *International Journal of Engineering and Technology*, 2(6).
- [345] Matteo Taiana, João Santos, J Gaspar, J Nascimento, Alexandre Bernardino, and P Lima. Tracking objects with generic calibrated sensors: an algorithm based on color and 3d shape features. *Robotics and autonomous systems*, 58(6):784–795, 2010.
- [346] Zheng Yangbing, Shang Kun, Ding Huan, and Xue Xiao. Vision system research of robocup middle size robot league. In *Multimedia and Information Technology (MMIT), 2010 Second International Conference on*, volume 1, pages 348–351. IEEE, 2010.
- [347] Amir AF Nassiraei, Yuichi Kitazumi, Shuichi Ishida, Hiroshi Toriyama, Hirokazu Ono, Kazutomo Takenaka, Noriyuki Shinpuku, Masakazu Takaki, Yuichiro Fukunaga, Kota Yamada, et al. Overview of hibikino-musashi hardware and software.
- [348] Josh Apple ME, Torrey Frank EE, Matt Saylor EE, and Ted Siegel ME. Robocup: A soccer playing robot. *SIGNAL*, 15:6kΩ.
- [349] Eduard P Enoiu and Raluca Marinescu. Soccer robot navigation in grid environments based on reinforcement learning algorithms.
- [350] Peng Dong, Hui-Min Lu, Shao-Wu Yang, Hui Zhang, and Zhi-Qiang Zheng. Ball velocity estimation method based on ransac and kalman filter for soccer robots. *Journal of Computer Applications*, 9:011, 2010.
- [351] Kouki Shimada, Yasutake Takahashi, and Minoru Asada. Efficient behavior learning by utilizing estimated state value of self and teammates. In *RoboCup 2009: Robot Soccer World Cup XIII*, pages 355–365. Springer, 2010.
- [352] Y Takemura and K Ishii. Adaptive color calibration algorithm using brain inspired technology. In *World Automation Congress (WAC), 2010*, pages 1–6. IEEE, 2010.
- [353] Yanwen Huang, Qixin Cao, and Chuntao Leng. The path-tracking controller based on dynamic model with slip for one four-wheeled omr. *Industrial Robot: An International Journal*, 37(2):193–201, 2010.
- [354] Martin Lauer, Roland Hafner, Sascha Lange, and Martin Riedmiller. Cognitive concepts in autonomous soccer playing robots. *Cognitive Systems Research*, 11(3):287–309, 2010.
- [355] Alexander Ferrein and Gerald Steinbauer. On the way to high-level programming for resource-limited embedded systems with golog. In *Simulation, Modeling, and Programming for Autonomous Robots*, pages 229–240. Springer, 2010.

- [356] Oliver Zweigle, U Kappeler, K Haussermann, and Paul Levi. Event based distributed real-time communication architecture for multi-agent systems. In *Computer Sciences and Convergence Information Technology (ICCIT), 2010 5th International Conference on*, pages 503–510. IEEE, 2010.
- [357] Andreas Witsch. *Applying policy gradient reinforcement learning to optimise robot behaviours*. PhD thesis, Masters thesis, University of Kassel, Germany, 2010.
- [358] C MARTINS. *Goalkeeper robot behavior design and coordination in soccer robotics*. PhD thesis, Masters thesis, Instituto Superior Técnico, 2010.
- [359] Nuno Rodrigues and Pedro Lima. Individual and cooperative behaviors representation based on petri nets (december 2010).
- [360] Jeroen De Best, Rene Van de Molengraft, and Maarten Steinbuch. A novel ball handling mechanism for the robocup middle size league. *Mechatronics*, 21(2):469–478, 2011.
- [361] Luís Mota, Luís Paulo Reis, and Nuno Lau. Multi-robot coordination using setplays in the middle-size and simulation leagues. *Mechatronics*, 21(2):434–444, 2011.
- [362] António JR Neves, Armando J Pinho, Daniel A Martins, and Bernardo Cunha. An efficient omnidirectional vision system for soccer robots: From calibration to object detection. *Mechatronics*, 21(2):399–410, 2011.
- [363] Nuno Lau, Luis Seabra Lopes, Gustavo Corrente, Nelson Filipe, and Ricardo Sequeira. Robot team coordination using dynamic role and positioning assignment and role based setplays. *Mechatronics*, 21(2):445–454, 2011.
- [364] Hendrik Skubch, Michael Wagner, Roland Reichle, and Kurt Geihs. A modelling language for cooperative plans in highly dynamic domains. *Mechatronics*, 21(2):423–433, 2011.
- [365] A Neves, JL Azevedo, B Cunha, R Dias, P Fonseca, N Lau, et al. Cambada2011: Team description paper. 2011. <http://robotica.ua.pt/CAMBADA/docs/qualif2011/CAMBADA-tdp-2011.pdf>.
- [366] João Silva, Nuno Lau, António JR Neves, João Rodrigues, and José Luís Azevedo. World modeling on an msl robotic soccer team. *Mechatronics*, 21(2):411–422, 2011.
- [367] Mark Wenig, Kenneth Pang, and Peter On. Arbitrarily colored ball detection using the structure tensor technique. *Mechatronics*, 21(2):367–372, 2011.
- [368] Armin Burchardt, Tim Laue, and Thomas Röfer. Optimizing particle filter parameters for self-localization. In *RoboCup 2010: Robot Soccer World Cup XIV*, pages 145–156. Springer, 2011.
- [369] Amir AF Nassiraei, Shuichi Ishida, Noriyuki Shinpuku, Miyuki Hayashi, Naoya Hirao, Kazunori Fujimoto, Kazutaka Fukuda, Kazutomo Takanaka, Ivan Godler, Kazuo Ishii, et al. Hibikino-musashi team description paper. *Proc. RoboCup Publisher, Team description of middle size robots*, 2011.
- [370] Jos Elfring, MJG van de Molengraft, RJM Janssen, and Maarten Steinbuch. Two level world modeling for cooperating robots using a multiple hypotheses filter. In *Robotics and Automation (ICRA), 2011 IEEE International Conference on*, pages 815–820. IEEE, 2011.
- [371] Hendrik Skubch, Daniel Saur, and Kurt Geihs. Resolving conflicts in highly reactive teams. In *OASIS-OpenAccess Series in Informatics*, volume 17. Schloss Dagstuhl-Leibniz-Zentrum fuer Informatik, 2011.
- [372] Joao Cunha, Eurico Pedrosa, Cristóvão Cruz, António JR Neves, and Nuno Lau. Using a depth camera for indoor robot localization and navigation. *DETI/IEETA-University of Aveiro, Portugal*, 2011.

- [373] Huimin Lu, Shaowu Yang, Hui Zhang, and Zhiqiang Zheng. A robust omnidirectional vision sensor for soccer robots. *Mechatronics*, 21(2):373–389, 2011.
- [374] Pedro U Lima, Pedro Santos, Ricardo Oliveira, Aamir Ahmad, and João Santos. Cooperative localization based on visually shared objects. In *RoboCup 2010: Robot Soccer World Cup XIV*, pages 350–361. Springer, 2011.
- [375] H Rajaie, O Zweigle, K Häussermann, U-P Käppeler, A Tamke, and P Levi. Hardware design and distributed embedded control architecture of a mobile soccer robot. *Mechatronics*, 21(2):455–468, 2011.
- [376] Ricardo Dias, António JR Neves, and José Luis Azevedo. Autonomous calibration for the kicking device of a soccer robot. In *Proc. of the 5th International Workshop on Intelligent Robotics, IROBOT*, 2011.
- [377] José Almeida, Alfredo Martins, André Dias, Hugo Silva, Carlos Almeida, Nuno Dias, Luis Lima, Tiago Santos, Ivo Costa, and Eduardo Silva. Iseporto robotic soccer team for robocup 2011: Improving defence and dynamic passing. *Instituto Superior de Engenharia do Porto*, 2011.
- [378] S Hamidreza Kasaei, S Mohammadreza Kasaei, S Alireza Kasaei, and S Amirhassan Monadjemi. Dynamic role engine and formation control for cooperating agents with robust decision-making algorithm. *Industrial Robot: An International Journal*, 38(2):153–162, 2011.
- [379] Michael Maier and Markus Brandner. Low-cost optical odometry for wheeled mobile robots. In *Instrumentation and Measurement Technology Conference (I2MTC), 2011 IEEE*, pages 1–4. IEEE, 2011.
- [380] Jianshen Liu, Baoyong Yin, and Xinxing Liao. Robot self-localization with optimized error minimizing for soccer contest. *Journal of Computers*, 6(7):1485–1492, 2011.
- [381] Stephan Opfer, Hendrik Skubch, and Kurt Geihs. Cooperative path planning for multi-robot systems in dynamic domains. *Mobile Robots-Control Architectures, Bio-Interfacing, Navigation, Multi Robot Motion Planning and Operator Training. InTech*, 2011.
- [382] Pedro Fonseca, António Neves, José Luís Azevedo, and Joao Silva. An heuristic for trajectory generation in mobile robotics. In *Emerging Technologies & Factory Automation (ETFA), 2011 IEEE 16th Conference on*, pages 1–4. IEEE, 2011.
- [383] CHENG Shuo-yuan, CHEN Wan-mi, GUI Chun-sheng, CHEN Hai-bo, LIU Jun-jiang, and LIN Kan. Implementation of dynamic role assignment mechanism in robocup middle size league competition. *Computer Technology and Development*, 10:004, 2011.
- [384] Stephan Opfer. Constraint-based multi-agent positioning. 2011.
- [385] Zhi-wen ZENG, Hui-min LU, Hui ZHANG, and Zhi-qiang ZHENG. Trajectory tracking based on model predictive control for omni-directional mobile robot. *Control Engineering of China*, page S1, 2011.
- [386] Zhao Zengrong. How to determine the optimal scoring policy. In *2011 Fourth International Conference on Intelligent Computation Technology and Automation*, volume 1, pages 1071–1073, 2011.
- [387] FMW Kanters, R Hoogendijk, RJM Janssen, KJ Meessen, JJTH de Best, DJH Bruijnen, GJL Naus, WHTM Aangenen, RBM van den Berg, HCT van de Loo, et al. Tech united eindhoven team description 2011.
- [388] Lin-bo WU, Xiang-ke WANG, Hui ZHANG, and Zhi-qiang ZHENG. A null-space-based control method for soccer robots. *Computer Engineering & Science*, 9:030, 2011.

- [389] Huan-huan YANG and Yi-min YANG. Football position prediction algorithm based on calculation of strong tracking and h $\tilde{}$ filter. *Journal of Computer Applications*, 12:040, 2011.
- [390] Yanfei Liu, Jiaxin Zhao, Josh Apple, Torrey Frank, Matthew Saylor, and Ted Siegel. An autonomous omnidirectional robot. *Journal of Robotics*, 2010, 2011.
- [391] AliReza Mohades Kasaei, HamidReza Mohadeskasaei, MohamadReza Mohadeskasaei, and Najmeh Ahmadi. A practical approach to implementation an autonomous soccer robot. *International Journal of Advanced Design and Manufacturing Technology*, 3(4):57–62, 2011.
- [392] Huimin Lu, Zhiwen Zeng, Dan Xiong, Qinghua Yu, Kaihong Huang, Shuai Cheng, Xiaoxiang Zheng, Junhao Xiao, and Zhiqiang Zheng. Nubot team description paper 2014.
- [393] Joao Silva. *Cooperative detection and identification of obstacles in a robotic soccer team*. PhD thesis, University of Aveiro, Portugal, 2011.
- [394] J Elfring, S van den Dries, MJG van de Molengraft, and H Bruyninckx. Knowledge-driven world modeling.
- [395] Wanmi Chen, Jinhuan Liu, and Shuoyuan Cheng. Two dots algorithm based on dynamic obstacle position prediction for soccer robots path planning. In *Intelligent Control and Automation (WCICA), 2011 9th World Congress on*, pages 627–631. IEEE, 2011.
- [396] JJPA Willems. Control of a hexapodal robot.
- [397] Amir Abdollahi Hosnijeh, Hooman Aghaebrahimi Samani, et al. An efficacious method to assemble a modern multi-modal robotic team: dilemmas, challenges, possibilities and solutions.
- [398] Alexander Jungmann and Bernd Kleinjohann. Automatic feature classification for object detection based on motion analysis. In *Automation, Robotics and Applications (ICARA), 2011 5th International Conference on*, pages 190–195. IEEE, 2011.
- [399] Martin Lauer, Miriam Schönbein, Sascha Lange, and Stefan Welker. 3d-objecttracking with a mixed omnidirectional stereo camera system. *Mechatronics*, 21(2):390–398, 2011.
- [400] Tim Brys. Local coordination and adaptive strategies in robot soccer. Master’s thesis, 2011.
- [401] Milton Roberto Heinen and Paulo Martins Engel. Igm: An incremental connectionist approach for concept formation, reinforcement learning and robotics. *Journal of Applied Computing Research*, 1(1):2–19, 2011.
- [402] Hugo Silva, André Dias, José Almeida, Alfredo Martins, and Eduardo Silva. Real-time 3d ball trajectory estimation for robocup middle size league using a single camera. In *RoboCup 2011: Robot Soccer World Cup XV*, pages 586–597. Springer, 2012.
- [403] J Lunenburg, T Clephas, N Dirkx, B Willems, J Elfring, J Sandee, and M van de Molengraft. Tech united eindhoven team description 2011. In *Proc. CD of the 15th RoboCup International Symposium (July 2011)*, 2012.
- [404] Aolin Tang, Qixin Cao, and Chunshan Xu. Design and analysis of an active ball-handling mechanism for soccer robot in robocup. *International Journal of Robotics and Automation*, 27(1):124, 2012.
- [405] Fernando Ribeiro, Gil Lopes, Bruno Pereira, João Silva, Paulo Ribeiro, João Costa, Sérgio Silva, João Rodrigues, and Paulo Trigueiros. Robot orientation with histograms on msl. In *RoboCup 2011: Robot Soccer World Cup XV*, pages 507–514. Springer, 2012.
- [406] Chen-Chien Hsu, Ching-Chang Wong, Hung-Chih Teng, and Cheng-Yao Ho. Dual-circle self-localization for soccer robots with omnidirectional vision. *Journal of the Chinese Institute of Engineers*, 35(6):619–631, 2012.

- [407] Fuminori Hibino, Yuta Ii, Yasutake Takahashi, and Yoichiro Maeda. Self-localization based on image features of omni-directional image. In *Soft Computing and Intelligent Systems (SCIS) and 13th International Symposium on Advanced Intelligent Systems (ISIS), 2012 Joint 6th International Conference on*, pages 2040–2043. IEEE, 2012.
- [408] João Cunha, Nuno Lau, and João Rodrigues. Ball interception behaviour in robotic soccer. In *RoboCup 2011: Robot Soccer World Cup XV*, pages 114–125. Springer, 2012.
- [409] Hooman Aghaebrahimi Samani, A Abdollahi, H Ostadi, and M DaneshPanah. Comprehensive omni-directional soccer player robots. *International Journal of Advanced Robotic Systems*.
- [410] Hendrik Skubch. Solving non-linear arithmetic constraints in soft realtime environments. In *Proceedings of the 27th Annual ACM Symposium on Applied Computing*, pages 67–73. ACM, 2012.
- [411] Yasutake Takahashi and Minoru Asada. Behavior acquisition in robocup middle size league domain.
- [412] Robin Soetens. Using a non-linear multilayer feedforward neural network for ballhandling control within robocup middle size league. 2012.
- [413] A Neves, JL Azevedo, B Cunha, R Dias, P Fonseca, N Lau, E Pedrosa, A Pereira, and J Silva. Cambada2012: Team description paper. 2012. <http://robotica.ua.pt/CAMBADA/docs/qualif2012/CAMBADA-tdp-2012.pdf>.
- [414] R Hoogendijk, GJL Naus, FBF Schoenmakers, CA Lopez, GM Martinez, JWM t Hoen, RJE Merry, and MJG van de Molengraft. Tech united eindhoven team description 2012.
- [415] André Gustavo Conceição, António Moreira, Paulo Costa, Pedro Costa, and Tiago Nascimento. Modeling omnidirectional mobile robots: An approach using simtwo. In *CON-TROLO2012*, 2012.
- [416] Gil Lopes, Fernando Ribeiro, and Nino Pereira. Catadioptric system optimisation for omnidirectional robocup msl robots. In *RoboCup 2011: Robot Soccer World Cup XV*, pages 318–328. Springer, 2012.
- [417] Guan Jiansheng, Fu Wei, Zeng Dexun, Wang Donglong, Tang Qiaheng, Zhang Qingyuan, Zhang Zhenjian, Lai Yangfan, Lin Jianbo, Chen Yuedong, et al. Ironbot team description paper 2012.
- [418] Wei Li, Huifeng Wang, and Lars Asplund. The design and implementation of soccer robot for robocup middle sized league. In *Advances in Automation and Robotics, Vol. 1*, pages 345–354. Springer, 2012.
- [419] Jens Schreiber. Testing cop-solvers with a hyper-redundant manipulator model. 2012.
- [420] MU Ying and MA Jing. Object recognition of soccer robot based on dsp. *Automation & Instrumentation*, 2:039, 2012.
- [421] Xin Luan, Wei Wei Qi, Tie Yi Zhu, Fang Jie Yu, and Da Lei Song. On-line adaptation to illumination change for mobile robot based on omni-directional vision. *Advanced Materials Research*, 462:252–258, 2012.
- [422] KP Gerrits. Ball handling system for tech united soccer robots. 2012.
- [423] Joao Carlos Galvao dos Reis. Distributed communications system for multi-robot systems. 2012.

- [424] Mohsen Taheri, Mohammad Naderi Dehkordi, Mehran Sharafi, and Mohammadhossein Nadimi. Control and analysis of an omnidirectional autonomous robot based on software approach and multimedia database. *Journal of Control Engineering and Applied Informatics*, 14(2):65–72, 2012.
- [425] Stephan Opfer. Towards description logic reasoning support for alicia. 2012.
- [426] Hendrik Skubch. *Modelling and Controlling of Behaviour for Autonomous Mobile Robots*. Springer, 2012.
- [427] SAM Coenen. Motion planning for mobile robots-a guide.
- [428] Nuno Figueiredo, António Neves, Nuno Lau, José Azevedo, Artur Pereira, and Gustavo Corrente. The base station application of the cambada robotic soccer team. *Electrónica e Telecomunicações*, 5(1):69–74, 2013.
- [429] Paulo Trigueiros, António Fernando Ribeiro, and Luis Paulo Reis. Vision based referee sign language recognition system for the robocup msl league. 2013.
- [430] Gerald Steinbauer. A survey about faults of robots used in robocup. In *RoboCup 2012: Robot Soccer World Cup XVI*, pages 344–355. Springer, 2013.
- [431] Xun Li, Huimin Lu, Dan Xiong, Hui Zhang, and Zhiqiang Zheng. A survey on visual perception for robocup msl soccer robots. *Int J Adv Robotic Sy*, 10(110), 2013.
- [432] Huimin Lu, Xun Li, Hui Zhang, Mei Hu, and Zhiqiang Zheng. Robust and real-time self-localization based on omnidirectional vision for soccer robots. *Advanced Robotics*, 27(10):799–811, 2013.
- [433] Alina Trifan, António JR Neves, and Bernardo Cunha. Evaluation of color spaces for user-supervised color classification in robotic vision. In *Proc. of the 17th International Conference on Image Processing, Computer Vision, & Pattern Recognition, Las Vegas, Nevada, USA (July 2013)*.
- [434] André Dias, Jose Almeida, Alfredo Martins, and Eduardo Silva. Real-time visual ground-truth system for indoor robotic applications. In *Pattern Recognition and Image Analysis*, pages 304–313. Springer, 2013.
- [435] Janno Lunenburg, Robin Soetens, Ferry Schoenmakers, Paul Metsemakers, René van de Molengraft, and Maarten Steinbuch. Sharing open hardware through rop, the robotic open platform. In *Proceedings of 17th annual RoboCup International Symposium, Lecture Notes in Artificial Intelligence (LNAI), page In Press. Springer-Verlag*, 2013.
- [436] Zhiwen Zeng, Huimin Lu, and Zhiqiang Zheng. In *Control and Decision Conference (CCDC), 2013 25th Chinese*.
- [437] Kurt Geihs. Self-adaptivity from different application perspectives. In *Software Engineering for Self-Adaptive Systems II*, pages 376–392. Springer, 2013.
- [438] João Silva, Mário Antunes, Nuno Lau, António JR Neves, and Luís Seabra Lopes. Aerial ball perception based on the use of a single perspective camera. In *Progress in Artificial Intelligence*, pages 235–246. Springer, 2013.
- [439] Qinghua Yu, Kaihong Huang, Huimin Lu, and Hongwu Guo. Object motion estimation and interception based on stereo vision for soccer robots in 3d space. In *Control Conference (CCC), 2013 32nd Chinese*, pages 5943–5948. IEEE, 2013.
- [440] João CG Reis, Pedro U Lima, and João Garcia. Efficient distributed communications for multi-robot systems. In *Proceedings of the RoboCup Symposium, LNAI. Springer*, 2013.

- [441] Jiehao Chen, Chen Ma, Zizhen Yan, Bo Chen, Yu Shen, and Yu Liang. Defensive strategy of the goalkeeper based on the 3d vision and field division for the middle-size league of robocup. In *GrC*, pages 49–52, 2013.
- [442] Jose Almeida, Andre Dias, João Sequeira, Alfredo Martins, and Eduardo Silva. Distributed active traction control system applied to the robocup middle size league. 2013.
- [443] Alina Trifan, António JR Neves, and Bernardo Cunha. An overview on the application of machine vision in soccer robots.
- [444] R Dias, AJR Neves, JL Azevedo, B Cunha, J Cunha, P Dias, A Domingos, L Ferreira, P Fonseca, N Lau, et al. Cambada2013: Team description paper. 2013. <http://robotica.ua.pt/CAMBADA/docs/qualif2013/CAMBADA-tdp-2013.pdf>.
- [445] Gustavo Corrente, Joao Cunha, Ricardo Sequeira, and Nuno Lau. Cooperative robotics: Passes in robotic soccer. In *Autonomous Robot Systems (Robotica), 2013 13th International Conference on*, pages 1–6. IEEE, 2013.
- [446] Sven Olufs and Markus Vincze. Embedded vision-based monte-carlo robot localisation without additional sensors. In *AFRICON, 2013*, pages 1–6. IEEE, 2013.
- [447] Xueyan Wang, Yong Zhao, and Song Chen. Water team description 2014.
- [448] Mahmoud El Shaikh, Andreas Koch, Bernd Eckstein, Kai Häussermann, Oliver Zweigle, and Paul Levi. Advanced perception for robots in a closed world environment. In *Intelligent Autonomous Systems 12*, pages 111–122. Springer, 2013.
- [449] Shuliang Wang, Chen Ma, Bo Chen, Ming Zhong, Jigao Fu, Jiehao Chen, Pingfan He, and Han Liang. Hierarchical group decision-making model for robot soccer based on finite-state transition. In *International Conference on Computer, Networks and Communication Engineering (ICCNCE 2013)*. Atlantis Press, 2013.
- [450] Jonas Logghe, André Dias, José Almeida, Alfredo Martins, and Eduardo Silva. Ball sensing in a leg like robotic kicker. In *RoboCup 2012: Robot Soccer World Cup XVI*, pages 298–309. Springer, 2013.
- [451] Ralf Hoyer, Andre Bartetzki, Dominik Kirchner, Andreas Witsch, MJG van de Molengraft, and Kurt Geihs. Giving robots a voice: A kineto-acoustic project. In *Arts and Technology*, pages 41–48. Springer, 2013.
- [452] Peter Teurlings. Redesign of a champion. 2013.
- [453] Yu Liang, Feng Han, Peng Liu, Wenbin Deng, Chong Zhao, Jie Xu, Yichuan Yang, Qiong Gao, Ji Qi, Yulin Wang, et al. Bitac 2013 team description paper.
- [454] Zhiwen Zeng, Dan Xiong, Qinghua Yu, Kaihong Huang, Shuai Cheng, Huimin Lu, Xiangke Wang, Hui Zhang, Xun Li, and Zhiqiang Zheng. Nubot team description paper 2013.
- [455] Aamir Ahmad, Tiago Nascimento, André GS Conceição, Antonio Paulo Moreira, and Pedro Lima. Perception-driven multi-robot formation control. In *Robotics and Automation (ICRA), 2013 IEEE International Conference on*, pages 1851–1856. IEEE, 2013.
- [456] Aamir Ahmad and Pedro Lima. Multi-robot cooperative spherical-object tracking in 3d space based on particle filters. *Robotics and Autonomous Systems*, 61(10):1084–1093, 2013.
- [457] Miguel Santos Serafim. Ball handling mechanisms for mobile robots. 2013.
- [458] Xiaoxiao Zhu and Qixin Cao. Calibrating distance mapping of non-svp catadioptric camera of the soccer robot. *Industrial Robot: An International Journal*, 40(5):462–473, 2013.

- [459] Hui Zhang, Huimin Lu, Peng Dong, Dan Xiong, and Zhiqiang Zheng. A novel generic ball recognition algorithm based on omnidirectional vision for soccer robots. *International Journal of Advanced Robotic Systems*, 10, 2013.
- [460] Asadollah Norouzi and Carlos Antonio Acosta. An approach to design a robust software architecture and an intelligent model for multi-agent systems. In *AI & Robotics and 5th RoboCup Iran Open International Symposium (RIOS), 2013 3rd Joint Conference of*, pages 1–7. IEEE, 2013.
- [461] Stefan Niemczyk, Dominik Kirchner, Andreas Witsch, Stephan Opfer, and Kurt Geihs. Distributed sensing in a robotic soccer team.
- [462] Yu Liang, Feng Han, Yu Shen, Jie Xu, Yichuan Yang, Ji Qi, Yulin Wang, Liming Gao, Bowei Zhang, Ke Jin, et al. Robit 2014 team description paper.
- [463] Aamir Ahmad, João Xavier, José Santos-Victor, and Pedro Lima. 3d to 2d bijection for spherical objects under equidistant fisheye projection. *Computer Vision and Image Understanding*, 2014.
- [464] R Dias, F Amaral, JL Azevedo, B Cunha, J Cunha, P Dias, N Lau, et al. Cambada2014: Team description paper. 2014. <http://robotica.ua.pt/CAMBADA/docs/qualif2014/CAMBADA-tdp-2014.pdf>.
- [465] Rob Hoogendijk. Human–robot interaction. 2014.
- [466] Josiah Walker, Trent Houliston, Brendan Annable, Alex Biddulph, Andrew Dabson, Jake Fountain, Taylor Johnson, Jordan Johnson, Mitchell Metcalfe, Anita Sugo, et al. The nubots team description paper 2014. *arXiv preprint arXiv:1403.6946*, 2014.